

Historic, Archive Document

Do not assume content reflects current scientific knowledge, policies, or practices.



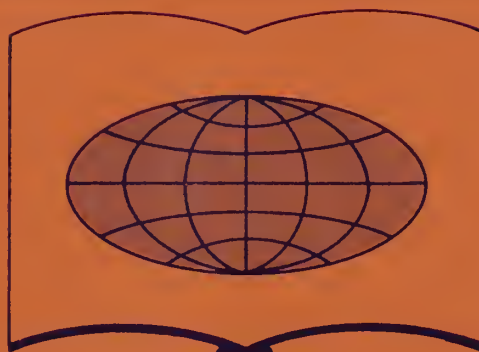
Reserve

A241

P43

Pesticides DOCUMENTATION BULLETIN

U.S. DEPARTMENT OF AGRICULTURE
FEDERAL AGRICULTURAL
LIBRARY
WASHINGTON, D.C. 20250



Volume 5
January 3, 1969

Number 1



Use Pesticides Safely

FOLLOW THE LABEL

U.S. DEPARTMENT OF AGRICULTURE

PESTICIDES DOCUMENTATION BULLETIN

328826

Volume 5
January 3, 1969
Number 1

A Bi-Weekly Publication of U.S. Department of Agriculture

OBJECTIVES AND SCOPE

The *Pesticides Documentation Bulletin* is compiled by the National Agricultural Library's Pesticides Information Center to facilitate national research efforts in all aspects of pest control. This bi-weekly index to the literature includes coverage of diseases, insects, nematodes, parasites, weeds and other pests affecting plants, animals, man, our natural resources and other values in man's environment. Special emphasis is given to the literature on toxicological, physiological and epidemiological aspects of pests and their control by chemical biological and integrated methods.

For broader coverage of literature on agriculture and related subjects, please consult the *Bibliography of Agriculture*, a monthly publication of the National Agricultural Library.

FORMAT

The *Bulletin* is a categorized bibliography, with citations arranged alphabetically by author under the following major subjects:

- 10 Entomology
- 20 Crop Protection
- 30 Livestock Protection
- 40 Commodity Protection
- 50 Environmental Contamination
- 55 Residues
- 60 Toxicology
- 65 Plant Physiology & Biochemistry
- 70 Chemistry
- 80 Engineering
- 90 Industry

Citations: Each citation consists of an accession number assigned serially with the last two digits representing the Bulletin's issue year, i.e. 3286-67. The citation number (minus the year) is used in all indices. Following the accession number is the full title of the article; all personal authors; an abbreviated journal title; volume, issue and inclusive page numbers; date of publication; language abbreviation, if other than English; and the National Agricultural Library's call number. Subject descriptors, patent or grant numbers, bibliographer's notes, and abstracts or extracts may follow each citation when appropriate.

Subject Index: Subject descriptors appear in the index followed by title arranged numerically by accession number. The Agricultural/Biological Vocabulary developed by the National Agricultural Library is used as a basic thesaurus of descriptors.

Biographical Index: Names of first authors are arranged alphabetically, followed by organizational affiliation and accession number.

Author Index: Names of personal authors are arranged alphabetically, followed by accession numbers of pertinent citations.

Organizational Index: Names of corporate authors or sponsoring organizations are arranged alphabetically followed by accession numbers of pertinent citations.

Other Files

In addition to the citations contained in the Bulletin, the Pesticides Information Center maintains two other files, the INTREDIS Register and the Herbicides Data File.

The INTREDIS Register is a computer data bank in the field of forest pathology. It contains title and author references to abstracted articles including subject, country, host plant genus or species, organisms causing the diseases, abstracting journal and year of publication. The computer search uses boolean parameters in any combination of elements listed.

The Herbicides Data File consists of reports on field tests conducted by the Crops Protection Research Branch, Crop Research Division, Agriculture Research Service. Each test record contains the following items of information:

- Compound Tested
- Company furnishing the compound
- Author or Investigator
- Test Sponsor
- Date
- Location
- Mode of Application
- Rates of Application
- Soil Types
- Carriers
- Crops or Weeds tested with phytotoxicity ratings
- Associated documentation

Note: Items subject to proprietary restriction will be suppressed when appropriate.

AVAILABILITY OF REFERENCES CITED

Search Requests

Each item appearing on magnetic tapes in the Pesticides Information Center is fully searchable on the computer. Questions submitted to the Center should fully describe all parameters of the desired information in narrative form.

Search requests may be submitted to:

U.S. Department of Agriculture
National Agricultural Library
PESTICIDES INFORMATION CENTER
Beltsville, Maryland 20705

Loans

Most of the material in the National Agricultural Library collection may be borrowed by employees of the Department of Agriculture and by other libraries. In requesting loans, please include the Library call number found with the citation. Loan of periodicals is restricted to the Washington, D.C. area. Foreign statistical publications and rare books are loaned only by special arrangement.

Free Distribution

U.S.D.A. publications: Domestic requests for publications of the United States Department of Agriculture will be supplied free to libraries and other qualified agencies and organizations upon application to the United States Department of Agriculture, Office of Information, Washington, D.C. 20250, as long as the supply lasts. Foreign institutions, organizations and agencies which issue publications may obtain U.S.D.A. publications in exchange by writing to the United States Department of Agriculture, National Agricultural Library, Exchange Unit, Washington, D.C. 20250.

State Agricultural Experiment Station and Extension Service publications are available except where noted, and as long as the supply lasts, from the issuing station or service. The National Agricultural Library does not distribute them; however, reproductions are available at regular Library rates.

Reproduction

All articles listed may be obtained in microfilm or photoprint form from the United States Department of Agriculture, National Agricultural Library, Photoduplication Section, Washington, D.C., 20250. Copying charges for each periodical or book are:

MICROFILMS: \$1.00 for each 30 pages or fraction copied from a single article or book.

PHOTOPRINTS: \$1.00 for each 4 pages or fraction copied from a single article or book.

RUSH SERVICE: Will be furnished upon payment of \$1.00 additional for each order.

Payment must accompany the order. Cash, Library coupons, check or money order drawn to the National Agricultural Library, U.S.D.A., are acceptable. Payment for orders originating outside of the United States should be made by American bank, or by UNESCO book coupons. Superintendent of Documents coupons and requests to furnish photocopy to be paid from Superintendent of Documents Deposit funds cannot be honored. Credit may be extended only to Government agencies and institutions. Billing address should be indicated.

Magnetic Tape Files

The files of the *Pesticides Documentation Bulletin*, its Vocabulary, the Herbicides Data, and INTREDIS are available on magnetic tape for the IBM-360 series computer. All tapes are nine-track, 800 bpi.

Tape prices are \$60.00 for the first tape reel on an order plus \$47.50 for each additional reel of magnetic tape. Tape orders may be submitted to:

U.S. Department of Agriculture
National Agricultural Library
AUTOMATION STAFF
Beltsville, Maryland 20705

Library Coupons

National Agricultural Library coupons, valued at \$1.00 each, may be purchased in any quantity.

ACKNOWLEDGMENT

The Pesticides Information Center, National Agricultural Library, gratefully acknowledges the cooperation and assistance of the Department of Defense; Health, Education, and Welfare; and Interior; the Federal Committee on Pest Control, and state and industrial organizations in the development of the Center and preparation of this Bulletin. Special thanks are expressed to the Federal Committee on Pest Control for its suggestions and support. We hope the Bulletin will serve as an example of the effectiveness of interdepartmental cooperation and the speed with which effective services can be developed through a coordinated and cooperative interdepartmental effort.

Use of funds for printing this publication approved by the Director of the Bureau of the Budget (May 23, 1968).

PLEASE GIVE COMPLETE BIBLIOGRAPHIC INFORMATION AS IT APPEARS IN THIS PUBLICATION FOR EACH ITEM REQUESTED.

This publication reports research involving pesticides. It does not contain recommendations for their use, nor does it imply that the uses discussed here have been registered. All uses of pesticides must be registered by appropriate State and/or Federal agencies before they can be recommended.

CAUTION: Pesticides can be injurious to humans, domestic animals, desirable plants, and fish or other wildlife—if they are not handled or applied properly. Use all pesticides selectively and carefully. Follow recommended practices for the disposal of surplus pesticides and pesticide containers.

For sale by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C., 20402. \$32.00 per year, domestic; \$40.00 per year, foreign. Single copies vary in price.

TABLE OF CONTENTS

BIBLIOGRAPHY (Citations)		<i>Page</i>
10 ENTOMOLOGY.....		1
Systematics.....		1
Physiology and Biochemistry.....		3
Genetics.....		8
Medical Entomology.....		8
20 CROP PROTECTION.....		8
Diseases.....		9
Arthropods.....		11
Nematodes.....		12
Weeds.....		12
Other Pests.....		13
30 LIVESTOCK PROTECTION.....		14
Diseases.....		14
Arthropods.....		18
Parasites.....		18
40 COMMODITY PROTECTION.....		18
Storage Diseases.....		18
Arthropods.....		*
Rodents and Other Pests.....		*
Microbial Contamination.....		19
50 ENVIRONMENTAL CONTAMINATION.....		19
55 RESIDUES.....		19
60 TOXICOLOGY.....		20
65 PLANT PHYSIOLOGY & BIOCHEMISTRY.....		21
70 CHEMISTRY.....		22
80 ENGINEERING.....		23
90 INDUSTRY.....		23
Economics.....		23
Education.....		24
Regulations.....		24
SUBJECT INDEX.....		25
BIOGRAPHICAL INDEX.....		77
AUTHOR INDEX.....		85
ORGANIZATIONAL INDEX.....		89

*This issue does not contain citations under this category.

Note: Mention of a company name or a proprietary product does not necessarily imply endorsement by the U.S. Department of Agriculture, NATIONAL AGRICULTURAL LIBRARY, PESTICIDES INFORMATION CENTER.

ENTOMOLOGY

1-69

RESISTANCE TO COLD IN CERATOMIA CATALPAE.

R P Dodds W R Webb

Nature 213(5071):102

07 Jan 1967 472 N21

Ceratonia catalpa, Cold, Larvae, Pyrausta nubilalis, Research, Tenthredinidae.

2-69

SECRETS OF THE INSECTS. (GE)

R Gerlach

317P HAMBURG, CLAASSEN

1967 QL467.G4

Entomologists, Insect behavior, Insect pests, Insect taxonomy, Insects.

3-69

EVERGLADES STATION KILLS HORN FLIES WITH DUST.

B W Hayes M J James D W Beardsley

Fla Cattleman Livestock J 33(3):26

Dec 1968 43.8 F66

Chemical control (insects), Dusting, Equipment, Haematobia irritans.

4-69

METABOLISM OF METHYLCARBAMATE INSECTICIDES BY THE NADPH2-REQUIRING ENZYME SYSTEM FROM HOUSEFLIES.

M Tsukamoto J E Casida

Nature 213(5071):49-51 REF

07 Jan 1967 472 N21

Abdomen, Carbamates, Chromatography, Enzymes, Insect metabolism, Insecticide resistant insects, Insecticides, Musca domestica, Toxicology.

SYSTEMATICS

5-69

A REVISION OF THE GENUS COPRIS MULLER OF THE WESTERN HEMISPHERE (COLEOPTERA, SCARABAEIDAE). MATTHEWS, E. G.

Entomol Amer (N s) 41:1-137 REF

1961 420 B792

Coprins, Insect biology, Insect morphology, Insect taxonomy, Polymorphism, Scarabaeidae.

6-69

SOME BIOLOGICAL NOTES ON THE PTEROMALID (HYM., CHALCIDOIDEA) GENERA CAENACIS FOERSTER, CECIDOSTIBA THOMSON AND HOBBYA DELUCCHI, WITH DESCRIPTIONS OF TWO NEW SPECIES.

R R Askew

Entomophaga 6(1):57-67 REF

1961 421 EN835

Caenacis, Cecidostiba, Hobbya, Hymenoptera, Insect biology, Insect identification, Pteromalidae, Taxonomy. French summary

7-69

THE NEMOURIDAE OF ASSAM (PLECOTOPERA).

J Aubert

Schweiz Entomol Ges Mitt 39(3/4):209-253 REF

15 Apr 1967 420 SW6

Insect taxonomy, Nemouridae, Zoogeography. 855 specimens were collected. 42 species of which 35 are new and localities are given. Taxonomy of all 42 species are given.

8-69

CONTRIBUTION TO THE KNOWLEDGE OF THE LEPIDOPTERA FAUNA OF IRAN. (FR)

J Barou

*Iran Inst Rech Entomol Phytopathol Entomol**Phytopathol Appl* (26):41-58 MAP

Nov 1967 464.9 P432

Insect taxonomy, Lepidoptera, Zoogeography. Persian translation. 355 species are listed.

9-69

STUDIES ON SOME SILVATIC RESERVOIRS AND VECTORS OF TRYPANOSOMA CRUZI. XXI: OBSERVATIONS ON THE ECOLOGY OF PANSTRONGYLUS GENICULATUS

(LATREILLE 1811) (HEMIPTERA REDUVIIDAE). (POR)

M P Barretto

Rev Brasil Biol 27(4):337-348 REF

Dec 1967 442.8 R326

Insect ecology, Insect vectors, Panstrongylus geniculatus, Reduviidae, Rodents, Surveys, Trypanosoma cruzi, Trypanosomiasis. English summary

10-69

SOMETIMES OLD COLLECTIONS CONTAIN SURPRISES. (NOCTUIDAE). (FR)

J T Betz

Alexandor 5(3):116-118

21 Sep 1967 421 AL2

Cucullia argentea, Noctuidae, Zoogeography.

11-69

SOME THOUGHTS ON THE PTEROPHORIDAE OF THE FRENCH FAUNA. (FR)

L Bigot

Alexandor 5(4):179-182

27 Dec 1967 421 AL2

Insect ecology, Insect taxonomy, Pterophoridae.

12-69

TAXONOMIC PROBLEMS IN ECOLOGICAL RESEARCH ON ENTOMOPHAGOUS INSECTS. (FR)

E Biliotti

Entomophaga 6(2):117-123 REF

1961 421 EN835

Ecology, Predaceous insects, Research, Taxonomy. English summary

13-69

SOME INTERESTING RHOPALOCERA OF EASTERN SPAIN. (FR)

F Bolland

Lambillionea 66(5/6):44-45

25 Apr 1967 420 N15

Agapetes ines, Agapetes syllius, Hesperidae, Rhopalocera, Zoogeography.

14-69

MATERIALS FOR A REVISION OF THE GENUS OREOPSYCHE (PSYCHIDAE). (FR)

J Bourgogne

Alexandor 5(4):149-160

27 Dec 1967 421 AL2

Insect taxonomy, Oreopsyche, Psychidae. Continuation and will be continued. 8 species of Oreopsyche are discussed.

15-69

MATERIALS FOR A REVISION OF THE GENUS OREOPSYCHE (PSYCHIDAE). (FR)

J Bourgogne

Alexandor 5(3):105-112

21 Sep 1967 421 AL2

Insect taxonomy, Oreopsyche, Psychidae. To be continued. 7 species of Oreopsyche are discussed.

16-69

LISTING OF THE TRIFID NOCTUIDAE OF FRANCE AND BELGIUM. (FR)

Ch Boursin

Alexandor 5(3):137-144

21 Sep 1967 421 AL2

Insect taxonomy, Noctuidae, Zoogeography. Continuation and will be continued.

17-69

NOTES ON THE CLASSIFICATION OF THE IBERIAN FAMILIES OF PARNASSIUS APOLLO (PAPILIONIDAE). (FR)

P Capdeville

Alexandor 5(4):167-172 MAP

27 Dec 1967 421 AL2

Insect taxonomy, Papilionidae, Parnassius apollo. Four species of Parnassius apollo are discussed.

18-69

DESCRIPTIONS OF NEW AND LITTLE KNOWN SPECIES OF MALLOPHAGA (INSECTA) FROM MARITIME HOSTS OF CHILE, SOUTH AMERICA.

M A Carriker

Chile Univ Centro Estud Entomol Publ (6):1-26

1964 420 C432

Birds, Insect identification, Insect taxonomy, Mallophaga, Parasitic insects.

19-69

BIBLIOGRAPHY ON THE SYSTEMATICS OF ENTOMOPHAGUS INSECTS VI. (FR)

Entomophaga 8(4):323-334 REF

1963 421 EN835

Bibliography, Insect taxonomy, Predaceous insects.

20-69

NOTES ON THE FAUNA OF THE ARMORICAIN MOUNTAINS. (FR)

J Chérel

Alexandor 5(4):173-178

27 Dec 1967 421 AL2

Noctuidae, Zoogeography. This is the concluding article. listing of over 100 species.

21-69

NOTES ON THE FAUNA OF THE ARMORICAIN MOUNTAINS. (FR)

J Chérel

Alexandor 5(3):121-128

21 Sep 1967 421 AL2

Lepidoptera, Zoogeography. Continuation and to be continued. listing of over 100 species.

22-69

SIALIS NIGRIPES PICTET, RAPPHIDIA (AGULLA) ALOYSIANA COSTA AND INOCELLIA KEISERI ASPOECK, NEW FOR SWITZERLAND. (NEUROPTERA S.L.). (GE)

W Eglin-dederig

Schweiz Entomol Ges Mitt 39(3/4):205-206

15 Apr 1967 420 SW6

Inocellia keiseri, Insect taxonomy, Raphidia aloysiana, Sialis nigripes, Zoogeography.

23-69

PRELIMINARY REPORT ON THE DISTRIBUTION IN SWITZERLAND OF BOREUS HIEMALIS L. AND BOREUS WESTWOODI HAG (MECOPTERA, BOREIDAE). (GE)

W Eglin-dederig

Schweiz Entomol Ges Mitt 39(3/4):207-208

15 Apr 1967 420 SW6

Boreidae, Boreus hiemalis, Boreus westwoodi, Insects, Zoogeography.

24-69

ORIGINAL DESCRIPTIONS, SYNONYMS AND GEOGRAPHICAL DISTRIBUTION OF THE SPECIES OF THE SYRPHIDAE (DIPTERA) FAMILY IN CHILE. (SP)

M Etcheverry

Chile Univ Centro Estud Entomol Publ (5):141P

REF

1963 420 C432

Diptera, Insect biology, Insect taxonomy, Nomenclature, Syrphidae, Zoogeography. Introduction in English. catalogue and bibliography in many languages.

25-69

FURTHER DESCRIPTIONS OF HALICTOPHAGUS PONTIFEX FOX AND H. REGINA FOX (STREPSIPTERA: HALICTOPHAGIDAE) FROM UGANDA.

D J Greathead

Roy Entomol Soc London Proc Ser B Taxonom

(SER B) 37(PT 7-8):91-97

04 Oct 1968 420 L84PB

Halictophagus, Insect identification, Strepsiptera, Zoogeography.

26-69

SUPPLEMENTARY NOTES ON THE ORBITALIS (WESTW.) GROUP OF ANTESTIOPSIS (HEMIPTERA, PENTATOMIDAE).

- D J Greathead
Bull Entomol Res 58(Pt 2):227-232 MAP
Nov 1968 421 B87
Antestropsis, Hemiptera, Taxonomy.
- 27-69
THE POSITION OF POLISTES (LEP-
TOPOLISTES) BISCHOFFI WEYRAUCH
(HYMENOPTERA: VESPIDAE). (IT)
D Guiglia
Schweiz Entomol Ges Mitt 39(3/4):199-206
15 Apr 1967 420 SW6
Insect identification, Insect taxonomy, Polistes
bischoffi, Vespidae.
- 28-69
AFRICAN TERMITES OF THE GENUS
SCHODORHINOTERMES (ISOPTERA:
RHINOTERMITIDAE) AND ASSOCIATED TER-
MITOPHILES (LEPIDOPTERA TINEIDAE).
W V Harris
Roy Entomol Soc London Proc Ser B Taxonom
(SER B)37(Pt 7-8):103-113 MAP REF
04 Oct 1968 420 L84PB
Paraclystis, Schodorhinotermes, Taxonomy,
Termites, Tineidae, Zoogeography.
- 29-69
INSECT HUNT BY ARTIFICIAL LIGHT IN THE
REGION OF CHARLEROI IN 1966. (FR)
J Heccq
Lambillionea 66(3/4):25-28
20 Apr 1967 420 N15
Lepidoptera, Light traps, Light trap collecting,
recorded on a monthly basis.
- 30-69
TACHINIDAE CATCH IN THE SWISS JURA,
USING TENT TRAPS. (GE)
B Herting
Schweiz Entomol Ges Mitt 39(3/4):191-198
15 Apr 1967 420 SW6
Insect taxonomy, Insect traps, Tachinidae,
Weather. Listing of many species.
- 31-69
THE SUBGENERA OF AUSTROLIMNIUS
(COLEOPTERA: ELMINTHIDAE).
H E Hinton
Roy Entomol Soc London Proc Ser B Taxonom
(SER B)37(Pt 7-8):98-102
04 Oct 1968 420 L84PB
Austrolimnius, Elmidae, Taxonomy. Includes: Bal-
telmis, Helonelmis, Tiphonelmis, Austrolimnius,
Helonastes, Helonoma, Pelonaetes, Tiphonaetes,
Ncosolus, Limnelmis, Telmatelmis.
- 32-69
FOUR NEW SPECIES AND A NEW GENUS OF
COCCIDAE (HOMOPTERA: COCCOIDEA)
FROM AFRICA.
C J Hodgson
Roy Entomol Soc London Proc Ser B Taxonom
(SER B)37(Pt 7-8):114-120
04 Oct 1968 420 L84PB
Coccidae, Coccus, Homoptera, Taxonomy, Um-
winsia cavernosa, Zoogeography.
- 33-69
A DEVIANT FORM OF AGLAIS URTICAE.
(NYMPHALIDAE). (FR)
R Hugot
Alexonor 5(3):132
21 Sep 1967 421 AL2
Aglais urticae, Insect taxonomy, Nymphalidae.
- 34-69
A NEW SUB-SPECIES OF CYNANDRA OPIS
DRURY. (FR)
M Lagnel
Lambillionea 66(3/4):23-25
20 Apr 1967 420 N15
Africa, Cynandra opis bernardii, Insect taxonomy,
Nymphalidae.
- 35-69
NEW SPECIES FOR THE BELGIAN FAUNA.
(FR)
A C Legrain

- Lambillionea* 66(3/4):17-18
20 Apr 1967 420 N15
Insect taxonomy, Noctuidae, Schrankia humidalis.
- 36-69
APAMEA PABULATRICULA BRAHM IN
BELGIUM. (NOCTUIDAE). (FR)
A C Legrain
Alexonor 5(3):118-120
21 Sep 1967 421 AL2
Apamea pabulatricula, Insect taxonomy, Noc-
tuidae, Zoogeography. Listing of all specimens
caught in Belgium.
- 37-69
HUNTING AT NIGHT AT LOSHEIMER-
GRABEN. (FR)
A C Legrain
Lambillionea 66(5/6):39-42
25 Apr 1967 420 N15
Insect collection, Insect taxonomy, Lepidoptera,
Zoogeography. Listing of the more interesting
specimens which were caught.
- 38-69
A GOOD REGION: BARVAUX S/OURTHE. (FR)
A C Legrain
Lambillionea 66(11/12):82-87
25 Dec 1967 420 N15
Insect collection, Lepidoptera. Author lists the
rarer specimens of many families caught on a col-
lecting trip.
- 39-69
NEW SPECIES FOR THE BELGIAN FAUNA.
(FR)
A C Legrain
Lambillionea 66(5/6):33-34
25 Apr 1967 420 N15
Lepidoptera, Sterra ochrata, Zoogeography.
- 40-69
BIOLOGICAL OBSERVATIONS ON RHAB-
DOPHAGA RAMICOLA RUBS. (FR)
E Loux
Marcellia 34(2):93-102
Jun 1967 421 M33
Cecidomyiidae, Diptera, Insect biology, Insect
rearing, Insect taxonomy, Rhabdophaga ramicola,
Salix.
- 41-69
MARKING INSECTS WITH DIETARY MAN-
GANESE FOR DETECTION BY NEUTRON AC-
TIVATION.
J Monro
Ecology 49(4,SUMMER):774-776
1968 410 EC7
Ceratitis capitata, Diet, Gamma rays, Insect rear-
ing, Manganese chloride, Micronutrients,
Neutrons.
- 42-69
TRICHOGRAMMIDAE--THE SMALLEST
WINGED INSECTS. (IT)
S Novitzky
Accod Naz Itol Entomol Atti 10:133-137
1962 420 AC2
Beneficial insects, Chalcidoidea, Insect taxonomy,
Polymorphism, Trichogrammatidae. English sum-
mary.
- 43-69
THE DIPTERA DESCRIBED BY W. J. RAIN-
BOW FROM FUNAFUTI ATOLL, ELLICE
ISLANDS.
A C Pont
Roy Entomol Soc London Proc Ser B Taxonom
(SER B)37(Pt 7-8):89-90
04 Oct 1968 420 L84PB
Diptera, Insect identification, Taxonomy,
Zoogeography.
- 44-69
A NEW JAPANESE SPECIES OF ATHERIGONA
ROND. (DIPTERA: MUSCIDAE) REARED
FROM SUGAR-CANE.
A C Pont
- Bull Entomol Res* 58(Pt 2):201-204
Nov 1968 421 B87
Atherigona, Diptera, Insect rearing, Muscidae, Su-
garcane, Taxonomy, Zoogeography.
- 45-69
THE NOMENCLATURE PROBLEM OF
TRICHOGRAMMA SPECIES. (GE)
W Quednau
Entomophaga 6(2):155-161
1961 421 EN835
Nomenclature, Taxonomy, Trichogrammatidae.
English summary
- 46-69
A MASSIVE INVASION OF STILPNOTIA SAL-
ICIS. (LYMANTRIIDAE). (FR)
L-H Ricorday
Alexonor 5(3):136
21 Sep 1967 421 AL2
Bears, Insect behavior, Insect outbreaks, Lyman-
triidae, Plant hosts, Populus, Stilpnotia salicis.
- 47-69
ICONOGRAPHY OF THE EGGS OF THE
LEPIDOPTERA FAUNA OF BELGIUM. (FR)
L G Sarlet
Lambillionea 66(3/4):28-32 (CONT.)
20 Apr 1967 420 N15
Insect eggs, Lepidoptera, Papilionidae.
- 48-69
A NEW SPECIES OF GALL GNAT MAMAEVIA
N.G.N.SP. (DIPTERA, ITONIDIDAE) FROM
BOHEMIA. (GE)
M Skuhrava
Marcellia 34(2):103-107
Jun 1967 421 M33
Cecidomyiidae, Gall-making insects, Insect taxono-
my, Mamaevia vysineki.
- 49-69
NEW SPECIES OF PALEARCTIC TORYMIDAE
(HYM. TORYMIDAE). (FR)
J R Steffan
Entomophaga 7(2):181-188
1962 421 EN835
Gall-making insects, Glyphomcrus signifer,
Monodontomerus gladius, Palearctic Region,
Pseudotorymus amethystinus, Torymidae,
Torymus favardi, Zoogeography. English summary.
- 50-69
THE BIOLOGY AND ECOLOGY OF THE
RHYPAROCHROMINAE OF NEW ENGLAND
(HETEROPTERA: LYGAEDIDAE). I.
M H Sweet
Entomol Amer (N s) 43:1-124
1963 420 B792
Insect biology, Insect ecology, Insect taxonomy,
Lygaeidae, Rhyparochrominae, Zoogeography. Ar-
ticle to be continued.
- 51-69
NOTES ON SOME APHIDS FROM VIETNAM,
WITH DESCRIPTION OF A NEW SPECIES
(HOMOPTERA, APHIDODEA).
H Szelegiewicz
Pol Akad Nauk Inst Zool Ann Zool 25(12):459-
471
1968 410.9 W26
Aphididae, Homoptera, Insect identification, In-
sect taxonomy.
- 52-69
AN INTERESTING SPECIMEN: CELAMA CEN-
TONALIS F. LITTORALIS PAUX. (ARCTIIDAE
NOLINAE). (FR)
H de Toulgoet
Alexonor 5(3):114-116
21 Sep 1967 421 AL2
Arctiidae, Celama centonalis littoralis, Insect tax-
onomy.
- 53-69
ON THE GENUS DEJANIRA THOMSON (COL.
CERAMBYCIDAE CERAMBYCINAE). (FR)
A Villiers
Soc Entomol France Ann 11(2):355-359

1966 420 F84
Cerambycidae, Dejanira, Insect taxonomy, Zoogeography.
Abstract

54-69
NOTES ON PLEBEIUS ARGYROGNOMON BGSTR. (LEPIDOPTERA, LYCAENIDAE). (FR)
J M. Warlet
Lamprolionea 66(11/12):93-95
25 Dec 1967 420 N15
Insect names, Insect taxonomy, Lycaenidae, Nomenclature, Plebejus argyrognomon.

PHYSIOLOGY AND BIOCHEMISTRY

55-69
SEX ATTRACTANT OF SUGAR BEET WIREWORK: IDENTIFICATION AND BIOLOGICAL ACTIVITY.
Plant Protect Abs 4:201
Sep 1968 241.75 P69
Elateridae, Insect behavior, Sex attractants, Sugar beets, Valeric acid. Science, vol. 159, Jan. 12, 1968, p.208-209.

56-69
CONTROLLING THE MEXICAN BEAN BEETLE.
U S D A Leaflet (548):8P
Dec 1968 1 AG84L
Accident prevention, Carbaryl, Chemical control (insects), Diazinon, Dimethoate, Epilachna varivestis, Insect morphology, Insect pests, Insecticide application, Insecticides, Integrated control (insects), Malathion, Methoxychlor, Spraying.

57-69
FOREST INSECTS. (GE)
G Amann
284P REF MELSUNGEN, VERLAG J. NEUMANN-NEUDAMM
1965 SB761.A4 1965
Coleoptera, Forest insects, Hymenoptera, Insect identification, Lepidoptera. Listing and description of many insects.

58-69
THE BIOCHEMISTRY AND MODE OF ACTION OF BACILLUS THURINGIENSIS BERLINER AND ITS VARIETIES.
T A Angus
Entomophaga Mem Hors Ser (2):165-173 REF
1964 421 EN835M
Bacillus thuringiensis, Biochemistry, Biological control (insects), Insect diseases, Toxins. French summary.

59-69
THE MEASUREMENT AND INTERRELATIONSHIPS OF INFECTIONS WITH NOSEMA APIS AND MALIPIGHAMOEBA MELLIFICAE OF HONEY-BEE POPULATIONS.
L Bailey
J Invertebrate Pathol 12(2):175-179 REF
Nov 1968 421 J826
Apis mellifera, Insect diseases, Malipighamoeba mellificae, Measurement, Nosema apis, Nosema disease, Population.

60-69
NOTES ON ENTOMOPHTHORACEOUS FUNGI IN POLAND.
A Batka
Entomophaga Mem Hors Ser (2):129-131 REF
1964 421 EN835M
Entomogenous fungi, Entomophthoraceae, Insect diseases. French summary

61-69
NEUROSECRETION IN DOLICHOPODA GENICULATA COSTA: OBSERVATIONS ON PARS INTERCEREBRALIS AND ON THE RETROCEREBRAL ENDOCRINE SYSTEM. (IT)
P Battaglini
Accad Naz Ital Entomol Atti 10:105-112 REF

1962 420 AC2
Dolichopoda geniculata, Endocrine glands, Glands (insects), Insect morphology, Nervous system, Secretion. English summary.

62-69
THE PRESENT STATUS OF MILKY DISEASE OF JAPANESE BEETLE IN CONNECTICUT.
R L Beard
Entomophaga Mem Hors Ser (2):47-49
1964 421 EN835M
Bacillus popilliae, Insect behavior, Insect diseases, Insect genetics, Milky disease, Popillia japonica. French summary.

63-69
CYTOLOGY OF MILKY DISEASE BACTERIA. II. MORPHOGENESIS OF BACILLUS POPILLIAE IN VITRO.
S H Black
J Invertebrate Pathol 12(2):158-167 REF
Nov 1968 421 J826
Bacillus popilliae, Bacteria, Culture media, Cytology, Insect diseases, Milky disease, Research.

64-69
CYTOLOGY OF MILKY DISEASE BACTERIA. I. MORPHOGENESIS OF BACILLUS POPILLIAE IN VIVO.
S H Black
J Invertebrate Pathol 12(2):148-157 REF
Nov 1968 421 J826
Bacillus popilliae, Bacteria, Culture media, Cytology, Insect diseases, Larvae, Milky disease, Morphology, Popillia japonica.

65-69
VITAMIN A DEFICIENCY: EFFECT ON MOSQUITO EYE ULTRASTRUCTURE.
J D Brammer R H White
Science 163(3869):821-823
21 Feb 1969 470 SCI2
Aedes aegypti, Cells, Deficiency diseases, Diet, Experimental insects, Eyes, Insect anatomy, Vitamin A.

66-69
THE FATE OF IMMATURE HOUSEFLY POPULATIONS AT LOW AND HIGH DENSITIES.
E H Bryant R R Sokal
Res Population Ecol 9(1):19-44
Jun 1967 420 K99
Eggs, Experimental insects, Insect physiology, Larvae, Musca domestica, Population, Pupae. Japanese summary.

67-69
THE METHODS OF TITRATION AND THE STANDARDIZATION OF BACILLUS THURINGIENSIS BERLINER PREPARATIONS. (FR)
A Burgerjon
Entomophaga Mem Hors Ser (2):255-262 REF
1964 421 EN835M
Bacillus thuringiensis, Dosage, Insecticides, Methodology, Mortality, Toxins. English summary.

68-69
STUDY OF THE SOLUBLE HEAT-STABLE TOXIN IN VARIOUS STRAINS OF BACILLUS THURINGIENSIS BERLINER. (FR)
A Burgerjon H de Barjac
Entomophaga Mem Hors Ser (2):221-226
1964 421 EN835M
Bacillus thuringiensis, Biochemistry, Biological assay, Heat, Insects, Mortality, Serological tests, Toxins. English summary. 25 strains of Bacillus thuringiensis are studied.

69-69
THE EXCRETION OF NITROGEN IN INSECTS.
E Bursell
Advances Insect Physiol 4:33-67 REF
1967 420 AD9
Amino acids, Ammonia, Insect physiology, Nitrogen, Urea.

70-69
IMAGE FORMATION AND SENSORY TRANSMISSION IN THE COMPOUND EYE.

E T Burtt W T Catton
Advances Insect Physiol 3:1-52 REF
1966 420 AD9
Arthropoda, Compound eye, Eyes, Insect physiology, Vision.

71-69
BIOLOGICAL NOTES ON EYE-FREQUENTING MOTHS FROM NORTH THAILAND.
W Buttiker
Schweiz Entomol Ges Mitt 39(3/4):151-179 MAP REF
15 Apr 1967 420 SW6
Geometridae, Insect behavior, Insect biology, Insect ecology, Insect taxonomy, Lycaenidae, Noctuidae, Parasitism, Pyralidae, Zoogeography.

72-69
SOME EXPERIENCES WITH THE USE OF BACILLUS THURINGIENSIS BERL. AGAINST FOREST PESTS. (GE)
M Capek A Heskova
Entomophaga Mem Hors Ser (2):337-339
1964 421 EN835M
Bacillus thuringiensis, Biological control (pests), Choristoneura murinana, DDT, Dosage, Forest insects, Porthetria dispar, Tree diseases. English summary.

73-69
AMINO ACID AND PROTEIN METABOLISM IN INSECT DEVELOPMENT.
P S Chen
Advances Insect Physiol 3:53-132 REF
1966 420 AD9
Amino acids, Insect genetics, Insect metabolism, Insect morphology, Insect physiology, Proteins.

74-69
INTERNATIONAL COLLOQUIUM ON INSECT PATHOLOGY AND MICROBIOLOGICAL CONTROL. (FR)
Entomophaga Mem Hors Ser (2):566P
1964 421 EN835M
Biological control (insects), Conferences, Insect diseases.

75-69
FEEDING BEHAVIOR AND NUTRITION IN GRASSHOPPERS AND LOCUSTS.
R H Dadd
Advances Insect Physiol 1:47-109 REF
1963 420 AD9
Acrididae, Feeding, Food, Grasshoppers, Insect behavior, Insect nutrition, Insect physiology, Nutrition.

76-69
SPECIES DIFFERENCES IN SCARAB-PASTURE RELATIONSHIPS.
R L Davidson R J Roberts
Bull Entomol Res 58(PT 2):315-324
Nov 1968 421 B87
Insect behavior, Insect identification, Scarabaeidae, Taxonomy.

77-69
A STUDY OF PROTEOLYTIC ENZYMES CONTAINED IN THE CHYLE OF PIERIS BRASSICAE AND OF SUBSTANCES ACTIVE ON THE CRYSTAL OF BACILLUS THURINGIENSIS. (FR)
R Debonder M Lecadent
Entomophaga Mem Hors Ser (2):197-203
1964 421 EN835M
Bacillus thuringiensis, Biochemistry, Chyle, Enzymes, Pieris brassicae, Proteins, Toxins. English summary.

78-69
CONTROLLING SOIL INSECTS WITH PARATHION-PENTACHLOROPHENOL COMPOSITIONS. PATENT 3,408,442.
J M Deming
Us Patent Office Offic Gaz 855(5):1379
29 Oct 1968 156.65 OF2
Chemical control (insects), Insect control, Parathion, Patents, Pentachlorophenol, Soil microorganisms, Soils.

79-69

RESIDUAL EFFECT OF A NUMBER OF INSECTICIDES ON ADULTS OF THE CARABID PSEUDOPHONUS RUFIPES (DEJ.).

J. B. M. van Dinther

Entomophaga 8(1):43-48

1963 421 EN835

Carabidae, Carbaryl, Dieldrin, DDT, Harpalus rufipes, Insecticides, Parathion, Residues, Toxaphene. French summary

80-69

CONTRIBUTIONS TO THE KNOWLEDGE OF POLISH SPECIES OF THE GENUS DORATURA J. SHLB. (HOMOPTERA, CICADELLIDAE). (POL)

I Dworakowska

Pol Akad Nauk Inst Zool Ann Zool 25(7):381-401

1968 410.9 W26

Doratura, Insect anatomy, Insect identification, Insect physiology. Russian and English summary

81-69

LONG OR TACTILE SETAE AND THE MICROSCOPIC OR PROPRIOCEPTOR SETAE IN AN HYPOTHETICAL SEGMENT OF LEPIDOPTERA. (SP)

M Etcheverry

Chile Univ Centro Estud Entomol Publ (6):27-32

1964 420 C432

Hair, Insect anatomy, Lepidoptera. English summary.

82-69

THE BIOLOGY OF ORGYIA ANTIQUA (LINAUS). (LEPIDOPTERA). (SP)

M Etcheverry M T Ramirez

Chile Univ Centro Estud Entomol Publ (6):59-66

REF

1964 420 C432

Insect biology, Insect rearing, Orgyia antiqua. English summary.

83-69

THE DEFENSE MECHANISM OF THE CUTICLE OF THE SUNN PEST (EURYGASTER INTEGRICEPS PUT.) AGAINST PLANT MICROORGANISMS. (FR)

A A Evlakhova T A Checkhourina

Entomophaga Mem Hors Ser (2):137-141

1964 421 EN835M

Beauveria bassiana, Cuticle, Eurygaster integriceps, Fungicides, Lipids. English summary.

84-69

THE OLIVE FLY, DACUS OLEAE GMEL. AND ITS PARASITES IN CORSICA, IN 1959 AND 1960. (FR)

M Feron R Benard S Poutut

Entomophaga 6(3):173-183 REF

1961 421 EN835

Dacus oleae, Insect behavior, Olives, Parasitism, Time. English summary

85-69

PALEARCTIC ENCYRTIDS PARASITES OF PSYLLIDS. (FR)

C Ferriere

Entomophaga 6(1):39-51 REF

1961 421 EN835

Encyrtidae, Insect behavior, Parasitism, Psyllidae. English summary

86-69

PRELIMINARY LABORATORY STUDY ON THE EFFECTS OF X RAYS ON THE FERTILITY OF THE APPLE MOTH (LASPEYRESIA POMONELLA L.). (FR)

A Fossati J Stahl M Baggiolini A Murbach

Switzerland Stat Essais Agr Lausanne Publ

60(3/4):263-269 REF

1968 105.5 SW63

Carpocapsa pomonella, Experimental insects, Fertility, Irradiation, Mutation, Pupae, X-rays. Reprint from Communications of the Swiss Entomological Society, Lausanne, Switzerland.

87-69

BIBLIOGRAPHY OF BIOLOGICAL CONTROL, V. (GE)

J M Franz

Entomophaga 5(4):295-335 REF

1960 421 EN835

Bibliography, Biological control (insects), Entomology. French and English summaries

88-69

BIBLIOGRAPHY OF BIOLOGICAL CONTROL, VI. (GE)

J M Franz

Entomophaga 6(4):277-329

1961 421 EN835

Bibliography, Biological control (insects), Entomology. French and English summaries

89-69

EFFECT OF THE TIME OF DAY AT WHICH HONEYBEE COLONIES ARE FIRST ALLOWED FLIGHT IN A NEW LOCATION ON THEIR CHOICE OF FLOWER SPECIES.

J B Free P M Nuttall

Plant Protect Abs 4:208-209

Sep 1968 241.75 P69

Apis mellifera, Environment, Flowers, Insect behavior, Insect flight, Social insects, Time. Nature, vol. 218, June 8, 1968, p.982.

90-69

MULTIPLE PARASITISM IN DIPAROPSIS WATERSI ROTH. (LEP. AGROTIDAE). (FR)

P F Galichet

Entomophaga 6(3):203-205

1961 421 EN835

Diparopsis watersi, Insect behavior, Lepidoptera, Parasitism. English summary

91-69

ENVIRONMENTAL HUMIDITY AND THE SUSCEPTIBILITY OF LARVAE OF ANAGASTA KUHNIELLA ZELL. TO BACILLUS THURINGIENSIS BERLINER.

N H E Gibson J Wolf

Entomophaga Mem Hors Ser (2):329-336 REF

1964 421 EN835M

Anagasta kuehniella, Bacillus thuringiensis, Biological control (insects), Environment, Humidity, Larvae, Mortality, Spores. French summary.

92-69

LIPID METABOLISM AND FUNCTION IN INSECTS.

L I Gilbert

Advances Insect Physiol 4:69-211 REF

1967 420 AD9

Biosynthesis, Hydrocarbons, Insect metabolism, Insect physiology, Isoprenoids, Lipids, Waxes.

93-69

BUTTERFLIES, COLLECTING AND REARING. (GE)

R Gleichauf

154P REF STUTTGART, VERLAG EUGEN

ULMER

1968 QL555.G3G4

Insect biology, Insect collecting equipment, Insect collection, Insect morphology, Insect names, Insect rearing, Insect rearing equipment, Lepidoptera.

94-69

LOOK WHAT'S HAPPENING TO INSECT CONTROL.

M C Goldman

Org Gard Farming 15(9):56-60

Sep 1968 57.8 OR32

Air pollution, Balance of nature, Biological control (insects), Chemosterilants, Environment, Insect diseases, Insect pests, Poisoning, Predaceous insects, Research.

95-69

THE TOXICITY OF INSECTICIDES TO LARVAE OF THE CODLING MOTH, CYDIA POMONELLA (L.). I. INTRINSIC TOXICITY AND PERSISTENCE. (ABSTRACT).

M Gratwick J M Sillibourne R P Tew

Pesticide Progr 5(3):72-73

May 1967 79.8 P434

Apples, Assay, Chemical control (insects), Cydia pomonella, Ddt, Insecticide application, Insecticide residues, Larvae, Moths, Toxicology. Abstract taken from Bull. Entom. Res. 56(2):367-376

96-69

THE PROTECTION OF DRIED SEA-FISH FROM INFESTATION BY DERMESTES FRISCHII KUG.

A A Green

Pyrethrum Post 9(2):24-33

Oct 1967 421 P99

Chemical control (insects), Dermestes frischii, Dried food, Fish, Food storage, Human nutrition, Insect control, Insecticide application, Insecticide residues, Malathion.

97-69

MELANIN IN AN INSECT, LUCILIA CUPRINA (WIED.).

R H Hackman

Nature 216(5111):163

14 Oct 1967 472 N21

Insect physiology, Lucilia cuprina, Melanins, Mutation, Proteins, Pupae.

98-69

METABOLIC CONTROL MECHANISMS IN INSECTS.

W R Harvey J A Haskell

Advances Insect Physiol 3:133-205 REF

1966 420 AD9

Biochemistry, Chromosomes, Enzymes, Insect metabolism, Insect physiology, Insect respiration, Mitochondria, Proteins.

99-69

GENERAL ASPECTS OF BACTERIOLOGICAL CONTROL.

A M Heimpel

Entomophaga Mem Hors Ser (2):23-33 REF

1964 421 EN835M

Biological control (pests), Entomogenous bacteria, Insect pests. French summary.

100-69

TESTS ON STANDARDIZATION OF BACILLUS THURINGIENSIS PREPARATIONS. (GE)

W Herfs A Krieg

Entomophaga Mem Hors Ser (2):263-265

1964 421 EN835M

Bacillus thuringiensis, Biological assay, Dosage, Larvae, Mortality, Pieris rapae, Porthetria dispar, Sodium arsenate. English summary.

101-69

THE BIOLOGY OF THANATOPSYCHE CHILENSIS (PHILIPPI). (LEPIDOPTERA). (SP)

J Herrera J Carrasco

Chile Univ Centro Estud Entomol Publ (6):33-43

1964 420 C432

Fruit, Insect biology, Insect rearing, Shade trees, Thanatopsyche chilensis. English summary.

102-69

SYNTHESIS OF RUBROSTERONE, A METABOLITE OF INSECT-MOULTING SUBSTANCES FROM ACHYRANTHES RUBROFUSCA.

H Hikino Y Hikino T Takemoto

Tetrahedron Lett (40):4255-4256

Aug 1968 385 T29

Achyranthes, Biochemistry, Molting (insects), Rubrosterone, Synthesis.

103-69

A NEW GENUS AND FOUR NEW SPECIES OF APHIDS (HOMOPTERA, APHIDIDAE) FROM POLAND.

S Huculak

Pol Akad Nauk Inst Zool Ann Zool 25(10):425-

451

15 Mar 1968 410.9 W26

Aphis berlinskii, Aphis tacita, Insect taxonomy, Neobacillaphis szcelegiewiczzi, Schizaphis dubia.

- 104-69**
DEVELOPMENTAL CYCLE AND PATHOLOGY OF A MICROSPORIDIOSIS BROUGHT ABOUT BY NOSEMA MELOLONTHAE (KRIEG) COMB. NOV. IN GRUBS OF MELOLONTHA MELOLONTHA (L.) (COL. MELOLONTHIDAE). (GE)
A Huger
Entomophaga Mem Hors Ser (2):83-90
1964 421 EN835M
Grubs, Insect diseases, Melolontha melolontha, Nosema melolonthae. English summary.
- 105-69**
SOME REMARKS ON THE HYDROPHILIA DISEASE OF THE LARVAE OF MELOLONTHA MELOLONTHA C.(COL. SCARABAEIDAE). (FR)
B Hurpin C Vago
Entomophaga 6(3):192-196
1961 421 EN835
Coleoptera, Insect diseases, Larvae, Melolontha melolontha, Rickettsiella, Scarabaeidae. German summary
- 106-69**
EFFECTS OF TEMPERATURE AND WATER ON VIABILITY AND VIRULENCE OF BACILLUS THURINGIENSIS VAR. THURINGIENSIS BERLINER SPORES.
C M Ignotto
Entomophaga Mem Hors Ser (2):293-298
1964 421 EN835M
Bacillus thuringiensis, Hydrogen-ion concentration, Pectinophora gossypiella, Spores, Temperature, Water. French summary.
- 107-69**
A METHOD FOR COUNTING BACTERIAL CELLS IN THE MIDGUT OF THE SILKWORM LARVAE, BOMBYX MORI L. (JA)
T Iizuka Y Takizawa
J Sericult Sci Jap 37(4):333-336
Aug 1968 425.9 SE6
Bacteria, Bombyx mori, Cells, Larvae, Methodology, Microscopy, Stomach. English summary.
- 108-69**
THE ROLE OF THE INTESTINAL MICROFLORA OF INSECTS IN THE DISEASE DEVELOPMENT BROUGHT ABOUT BY BAC. CEREUS VAR. GALLERIAE. (FR)
N P Isakova
Entomophaga Mem Hors Ser (2):175-178
1964 421 EN835M
Bacillus cereus, Bacteria, Biological control (insects), Dosage, Galleria mellonella, Insect diseases, Pieris brassicae. English summary.
- 109-69**
THE PRODUCTIVITY OF GLOSSINA AUSTENI NEWST. MAINTAINED ON COP-EARED RABBITS.
A M Jordan C F Curtis
Bull Entomol Res 58(PT 2):399-410 REF
Nov 1968 421 B87
Glossina austeni, Insect physiology, Insect rearing, Rabbits.
- 110-69**
THE BIOCHEMISTRY OF THE INSECT FAT BODY.
B A Kilby
Advances Insect Physiol 1:111-174 REF
1963 420 AD9
Amino acids, Biochemistry, Carbohydrates, Fat body, Insect physiology, Metabolism, Pigments (insect), Proteins, Pteridine, Purines.
- 111-69**
THE FATE OF SPORES OF NOSEMA APIS ZANDER INGESTED BY MUSCOID FLIES.
J P Kramer
Entomophaga Mem Hors Ser (2):95-99
1964 421 EN835M
Apis mellifera, Calliphora vicina, Insect diseases, Musca domestica, Nosema apis, Phormia regina. French summary.
- 112-69**
SIDE EFFECTS OF BACILLUS THURINGIENSIS. THE EFFECTS ON BEES (APIS MEL-LIFERA L.). (GE)
A Krieg W Hcrfs
Entomophaga Mem Hors Ser (2):193-195
1964 421 EN835M
Apis mellifera, Bacillus thuringiensis, Dosage, Insect diseases, Mortality. English summary.
- 113-69**
THE EFFECT OF FEEDING THE TSETSE FLY GLOSSINA MORSITANS WESTW. ON IMPALA BLOOD.
P A Langley
Bull Entomol Res 58(PT 2):295-298
Nov 1968 421 B87
Antelopes, Blood, Feeding, Glossina morsitans.
- 114-69**
COMPARATIVE STUDY OF THE ENZYMATIC HYDROLYSIS OF THE CRYSTALS OF THE STRAINS OF BACILLUS THURINGIENSIS SEROTYPE I BERLINER AND SEROTYPE II ANDUZE. (FE)
M Lecadet D Martouret
Entomophaga Mem Hors Ser (2):205-212
1964 421 EN835M
Bacillus thuringiensis, Chyle, Enzymes, Pieris brassicae, Toxicity. English summary.
- 115-69**
THE CONTROL OF POLYMORPHISM IN APHIDS.
A D Lees
Advances Insect Physiol 3:207-277 REF
1966 420 AD9
Aphididae, Insect physiology, Nomenclature, Polymorphism, Wings (insects).
- 116-69**
LARVAL MOVEMENT OF LASIODERMA SERRICORNE (F.) (COLEOPTERA ANOBIIDAE) IN A PLANE.
L P Lefkovich
Res Population Ecol 9(1):45-52
Jun 1967 420 K99
Insect migration, Insect physiology, Larvae, Lasioderma serricorne, Population. Japanese summary.
- 117-69**
FLY ENEMIES...YOUR ALLIES.
E F Legner G S Olton
World Farming 10(10):17,25
Oct 1968 30.08 W89
Biological control (insects), Breeding, Diptera, Food, Insect control, Insecticide residues, Parasitism, Predaceous insects.
- 118-69**
COMPLEMENT TO THE STUDY OF THE LARVAL BIOLOGY OF SYMMITICUS COSTATUS LOEW (DIPTERA NEMESTRINIDAE), A GRASSHOPPER PARASITE, AND GENERAL CONSIDERATIONS ON THE BIOLOGY OF NEMESTRINIDAE. (FR)
J-c Leonide
Entomophaga 8(1):7-33 REF
1963 421 EN835
Diptera, Grasshoppers, Host-parasite relations, Insect biology, Larvae, Nemertrinae, Parasitic insects, Symmiticus costatus, Tables (data). English summary.
- 119-69**
HYBRIDS OF NEPHOTETTIX IMPICTICEPS ISH. AND N. APICALIS (MOTSCH.) AND THEIR ABILITY TO TRANSMIT THE TUNGRO VIRUS TO RICE.
K C Ling
Bull Entomol Res 58(PT 2):393-398 REF
Nov 1968 421 B87
Insect vectors, Nephotettix apicalis, Nephotettix impecticeps, Rice, Tungro.
- 120-69**
A NEW NOSEMA SP. OF EUPROCTIS CHRYSORRHOEA L.
J J Lipa
Entomophaga Mem Hors Ser (2):77-81
1964 421 EN835M
Diagnosis, Infectious diseases, Insect diseases, Nosema, Nygmia phaeorrhoea. French summary.
- 121-69**
THE OCCURRENCE OF A CRITHIDIA SPECIES WITHIN THE GUT OF THE HONEY BEE, APIS MELLIFICA L.
J Lom
Entomophaga Mem Hors Ser (2):91-92
1964 421 EN835M
Apis mellifera, Insect diseases, Nosema apis, Nosema disease. French summary.
- 122-69**
NEW FACTS CONCERNING THE EXTRUSION OF MICROSPORIDIAN SPORES.
J Lom J Vavra
Entomophaga Mem Hors Ser (2):101-103
1964 421 EN835M
Biological control (pests), Electron microscopy, Insect diseases, Microsporidia, Spores. French summary.
- 123-69**
EFFECTS OF TEMPERATURE AND PHOTOPERIOD ON LARVAL DEVELOPMENT IN LESTES EURINUS (ODONATA: LESTIDAE).
P E Lutz
Ecology 49(4,SUMMER):637-644 REF
1968 410 EC7
Insect physiology, Larvae, Lestes eurinus, Light, Odonata, Temperature.
- 124-69**
SOME THOUGHTS ON THE TAXONOMY OF BACILLUS THURINGIENSIS BERLINER.
O Lysenko
Entomophaga Mem Hors Ser (2):239-244
1964 421 EN835M
Bacillus thuringiensis, Insect diseases, Taxonomy. French summary.
- 125-69**
CAN ONE RECONCILE THE CONTROL OF SAN JOSE SCALE (QUADRASPIDIOTUS PERNICIOSUS COMST.) WITH THE FIGHT AGAINST THE CARPOCAPSA (CARPOCAPSA POMONELLA L.). (FR)
G Mathys
Switzerland Stat Essais Agr Lausanne Publ (781):2P
Feb 1967 105.5 SW63
Aspidiotus perniciosus, Carpopapsa, Chemical control (insects), Dichlorvos, Insecticide application, Larvae, Parathion, Phosphoric acid esters. Extract from Romand Agriculture, ser a, 6(2):24-26, 1967.
- 126-69**
INFESTATION OF EMULSION PAINT BY THE FLY MEGASCLIA SCALARIS (LOEW) (DIPT., PHORIDAE).
A W R McCrae
Entomol Mon Mag 102(1229-1231):241-243
Oct 1966 421 EN86
Feeding, Insect adaptation, Megasclia scalaris, Paints, Phoridae.
- 127-69**
MORPHOLOGICAL AND BIOLOGICAL INVESTIGATIONS ON CLONES AND FIELD POPULATIONS OF THE FOXGLOVE-APHID, AULACORTHUM SOLANI KLTB. 1843 SENSU LATIORE (HEMIPT. APHID.). (GE)
W Meier
Schweiz Entomol Ges Mitt 39(3/4):129-150
15 Apr 1967 420 SW6
Aulacorthum solani, Clones, Insect biology, Insect morphology, Plant hosts, Population, Tables (data). English summary.
- 128-69**
THE REGULATION OF BREATHING IN INSECTS.
P L Miller
Advances Insect Physiol 3:279-354 REF

1966 420 AD9

Insect flight, Insect physiology, Respiration, Spiracles, Trachea, Ventilation.

129-69

CONCERNING SOME ASPECTS OF TISSUE NOURISHING GALL MITES. (FR)

C Moha

Marcellia 34(2):67-91 REF

Jun 1967 421 M33

Cell division, Cytology, Cytoplasm, Eriophyidae, Gall-making insects, Plant galls, Plant nutrition, Plasmolysis, Tissues.

130-69

THE CHANGE IN VOLTINISM IN BOMBYX MORI L., BY INJECTION OF EITHER ADRENALIN OR INSULIN. (PRELIMINARY NOTE).

S Morohoshi T Ohkuma

J Sericult Sci Jap 37(4):274-280

Aug 1968 425.9 SE6

Biochemistry, Bombyx mori, Epinephrine, Food poisoning, Hormones, Injections, Insect eggs, Insulin, Metabolism. Japanese summary.

131-69

INSECT MYCOLOGY: GLIMPSES AND PERSPECTIVES. (GE)

E Muller-Kogler

Entomophaga Mem Hors Ser (2):111-124 REF

1964 421 EN835M

Biological control (pests), Entomogenous fungi, Fungicides, Insect diseases, Insecticides, Microclimate, Soil moisture, Soil temperature. English summary.

132-69

THE PROPERTIES OF INSECT AXONS.

T Narahashi

Advances Insect Physiol 1:175-256 REF

1963 420 AD9

Insect physiology, Insecticides, Nerves, Properties.

133-69

INTEGUMENTAL PIGMENTS OF THE MILIPEDE, POLYDESMUS ANGUSTUS (LATZEL).

A E Needham

Nature 217(5132):975-977

09 Mar 1968 472 N21

Absorption spectra, Biochemistry, Color, Insect morphology, Pigments (insect), Polydesmus, Porphyrins, Tissues.

134-69

CHITIN ORIENTATION IN CUTICLE AND ITS CONTROL.

A C Neville

Advances Insect Physiol 4:213-286 REF

1967 420 AD9

Chitin, Cuticle, Insect physiology.

135-69

THE EFFECTIVE BREADTH AND ACTION OF TEMIK. (EXPERIENCES FROM GERMANY). (GE)

H H Nolle A Schneider

Pflanzenschutzberichte 38(3/4):33-45

Jun 1968 464.9 P48

Acaricides, Carbamates, Chemical control (insects), Chemical control (nematodes), Humidity, Humus, Insecticides, Nematocides, Soil series, Soil temperature, Temik. English summary.

136-69

THE USE OF MICRO-ORGANISMS FOR THE CONTROL OF INSECT PESTS.

J R Norris

Chem Indus (46):1941-1945

18 Nov 1967 382 M31C

Bactericides, Beauveria bassiana, Biological control (insects), Bombyx mori, Fungus diseases (insects), Insect diseases, Insecticides, Microbiology, Microorganisms, Pest control, Virus diseases (insects).

137-69

OBSERVATIONS ON THE REPRODUCTION OF HEMITARSONEMUS LATUS (BANKS) (ACARINA TARSONEMIDAE). (IT)

A Nucifora

Accad Naz Ital Entomol Atti 10:142-153 REF

1962 420 AC2

Hemitarsonemus latus, Insect behavior, Mites, Reproduction, Scx behavior. English summary

138-69

ON THE ACCESSORY GLANDS OF THE MALE REPRODUCTIVE APPARATUS OF DOLICHOPODA GENICULATA COSTA (ORTHOPTERA, RAPHIOPHORIDAE). (IT)

E Onesto

Accad Naz Ital Entomol Atti 10:91-95

1962 420 AC2

Dolichopoda geniculata, Glands (insects), Insect anatomy, Insect histology, Insect morphology, Reproductive organs. French summary.

139-69

EFFECT OF SUPERPARASITISM ON THE DEVELOPMENT, SEX RATIO AND PROGENY OF BRACON GREENI ASHMEAD.

L M Pramanik M K Choudhury

Entomophaga 8(1):83-86

1963 421 EN835

Bracon greeni, Ectoparasites, Eublemma amabilis, Insect biology, Lac, Tables (data). French summary.

140-69

RESISTANCE CAPACITY OF TICKS AGAINST STARVATION UNDER LABORATORY CONDITIONS.

T S Rao

Andhra Agr J 15(1):29-30

1968 34.2 AN4

Buffaloes, Cattle, Hyalomma aegyptium, Rhipicephalus sanguineus, Starvation.

141-69

FROM GRASSHOPPER TO A LOCUST.

Y S Rathore V N Upadhyaya

Allahabad Farmer 42(1):47-50 REF

Jan 1968 22 AL5

Acrididae, Color, Grasshoppers, Insect behavior, Insect pests, Population, Social insects.

142-69

LABORATORY TESTS OF BACILLUS THURINGIENSIS BERLINER PREPARATIONS AGAINST LARVAE OF CARPOCAPSA (LASPEYRESIA POMONELLA L.). (FR)

R Roehrich

Entomophaga Mem Hors Ser (2):309-314

1964 421 EN835M

Bacillus thuringiensis, Biological control (insects), Carpopapsa pomonella, Dosage, Insect nutrition, Larvae, Mortality. English summary.

143-69

THE PRINCIPAL PARASITES OBSERVED ON THE LEAF ROLLER MOTHS OF SPAIN WITH PARTICULAR ATTENTION TO LYMANTRIA DISPAR. L. (SP)

N Romanyk A Ruperez

Entomophaga 5(3):229-236 REF

1960 421 EN835

Insect behavior, Parasitism, Porthetria dispar, Tortricidae. French summary

144-69

THE CHITIN/PROTEIN COMPLEXES OF INSECT CUTICLES.

K M Rudall

Advances Insect Physiol 1:257-313 REF

1963 420 AD9

Chitin, Cuticle, Electron microscopes, Insect physiology, Proteins, X-rays.

145-69

PATHOLOGIC COMPLICATIONS DURING THE LARVAL DEVELOPMENT OF LYMANTRIA DISPAR IN THE LABORATORY. (FR)

A Ruperez

Entomophaga Mem Hors Ser (2):37-40

1964 421 EN835M

Antibiotics, Bacterial diseases (insects), Insect diseases, Insect morphology, Larvae, Porthetria dispar. English summary.

146-69

BITING CYCLES AND PARITY OF THE MOSQUITO MANSONIA (MANSONIOIDES) UNIFORMIS (THEO.) IN CEYLON.

W A Samarawickrama

Bull Entomol Res 58(PT 2):299-314 MAP REF

Nov 1968 421 B87

Diurnal rhythm, Insect behavior, Mansonia uniformis, Zoogeography.

147-69

ICONOGRAPHY OF THE EGGS OF THE LEPIDOPTERA FAUNA OF BELGIUM. (FR)

L G Sarlet

Lambilliona 66(5/6):45-48

25 Apr 1967 420 N15

Hesperiidae, Insect eggs, Lepidoptera, Reviews. Continuation from a previous issue and to be continued.

148-69

ICONOGRAPHY OF THE EGGS OF THE LEPIDOPTERA FAUNA OF BELGIUM. (FR)

L G Sarlet

Lambilliona 66(11/12):99-102

25 Dec 1967 420 N15

Insect eggs, Lepidoptera, Reviews. Continuation from a previous issue and to be continued.

149-69

ON ARTHROPOD DEFENSIVE SECRETIONS XXV. ANTHRANILIC ACID AS A PRECURSOR OF GLOMERIN AND HOMOGLOMERIN, ALKALOIDS FROM ARTHROPODS. (GE)

H Schildknecht W F Wenneis

Tetrahedron Lett (19):1815-1818 REF

May 1967 385 T29

Alkaloids, Anthranilic acid, Arthropoda, Biochemistry, Insect behavior, Secretion.

150-69

NOTONECTA BOREALIS BUENO AND HUSSEY (HEM., NOTONECTIDAE): A FLIGHTLESS SPECIES.

G G E Scudder

Entomol Mon Mag 102(1229-1231):258-259

REF

Oct 1966 421 EN86

Environment, Insect adaptation, Insect flight, Insect migration, Notonectidae.

151-69

PRE-GRAVID PHASE OF OVARIAN DEVELOPMENT IN AEDES DETRITUS HALIDAY.

M W Service

Nature 217(5129):681-682

17 Feb 1968 472 N21

Aedes detritus, Blood, Feeding, Insect eggs, Insect morphology, Metamorphosis, Oogenesis, Ovaries, Tables (data).

152-69

OSMOTIC AND IONIC REGULATION IN INSECTS.

J Shaw R H Stobart

Advances Insect Physiol

1963 420 AD9

Aquatic insects, Insect physiology, Ions, Osmosis.

153-69

A MODEL OF THE PLANT-TO-PLANT MOVEMENT OF APHIDS. I. DESCRIPTION OF THE MODEL.

M Shiyomi

Res Population Ecol 9(1):53-61

Jun 1967 420 K99

Aphididae, Barley, Frequency distribution, Insect behavior, Insect migration, Rhopalosiphum maidis, Statistical analysis, Zoogeography. Japanese summary.

- 154-69**
CONSIDERATIONS ON THE TOXIC AND LABILE SUBSTANCE PRODUCED BY BACILLUS THURINGIENSIS VAR. THURINGIENSIS BERLINER (LABILE EXOTOXIN).
 W A Smirnoff
Entomophaga Mem Hors Ser (2):249-254
 1964 421 EN835M
Bacillus thuringiensis, Diprionidae, Mortality, *Pristiphora erichsonii*, Tenthredinidae, Toxins. French summary.
- 155-69**
FUNCTIONAL ASPECTS OF THE ORGANIZATION OF THE INSECT NERVOUS SYSTEM.
 D S Smith J E Treherne
Advances Insect Physiol 1:401-484 REF
 1963 420 AD9
 Insect physiology, Muscles, Nervous system.
- 156-69**
COMPUTING A POPULATION BUDGET FROM SEQUENTIALLY SACRIFICED, REPLICATED CULTURES.
 R R Sokal E H Bryant
Res Population Ecol 9(1):10-18
 Jun 1967 420 K99
 Experimental design, Insect eggs, Larvae, *Musca domestica*, Population statistics, Pupae, Statistical methods. Japanese summary.
- 157-69**
THE EFFECTS OF INSECTICIDES ON THE INTERRELATIONSHIP BETWEEN APHIS FABAE SCOP. AND SOME OF ITS EPISITES. (GE)
 R Sol
Entomophaga 6(1):7-33 REF
 1961 421 EN835
Aphis fabae, Biochemistry, Insect behavior, Insecticides. English summary
- 158-69**
A MICROSPORIDIAN, THELOHANIA SP., PATHOGENIC FOR THE CABBAGE LOOPER TRICHOPLUSIA NI.
 C M Splittstoesser F L McEwen
J Invertebrate Pathol 12(2):231-237
 Nov 1968 421 J826
 Dosage, *Hyalophora cecropia*, Insect diseases, Mortality, *Thelohania*, *Trichoplusia ni*.
- 159-69**
A NEW CONTRIBUTION TO THE STUDY OF THE CABBAGE MOTH CONTROL (MAMESTRA BRASSICAE L.). (SE)
 A Stankovic D Camprag R Skulic D Varga M Glozanski M Vrgov
Agrohemija (516):207-216 REF
 1968 385 AG87
 Biochemistry, Biological control (insects), *Cercospora beticola*, Chemical control (insects), Experimental insects, Insecticides, *Mamestra brassicae*, Parasitism, Research, Sugar beets. English summary.
- 160-69**
BIONOMICS AND ECOLOGY OF EPHEDRUS PULCHELLUS STELFOX AN IMPORTANT PARASITE OF LEAF-CURLING APHIDS IN CZECHOSLOVAKIA WITH NOTES ON THE DIAPAUSE (HYM. APHIDIIDAE).
 P Stary
Entomophaga 7(2):91-100
 1962 421 EN835
 Aphididae, Biological control (insects), *Ephedrus persicae*, Insect biology, Insect ecology, Larvae, Parasitic insects. French summary.
- 161-69**
INVESTIGATIONS CONCERNING THE BIOLOGICAL CONTROL OF THE APPLE MOTH (CARPOCAPSA POMONELLA (L.)) BY MEANS OF EGG PARASITES OF THE GENUS TRICHOGRAMMA. (GE)
 W Stein
Entomophaga 5(3):237-259 REF
 1960 421 EN835
- Biological control (insects), *Carpocapsa pomonella*, Insect behavior, Insect eggs, Parasitism, Research, *Trichogrammatidae*. English summary
- 162-69**
DIAGNOSIS: A CENTRAL PILLAR OF INSECT PATHOLOGY.
 E A Steinhaus
Entomophaga Mem Hors Ser (2):7-21
 1964 421 EN835M
 Diagnosis, Insect diseases, International cooperation, Laboratories, Symptomatology. French summary
- 163-69**
STRUCTURE OF CYASTERONE, A NOVEL C29 INSECT-MOULTING SUBSTANCE FROM CYATHULA CAPITATA.
 T Takemoto Y Hikino K Nomoto H Hikino
Tetrahedron Lett (50):5136
 Dec 1967 385 T29
 Carbon isotopes, Cyasterone, *Cyathula capitata*, Insect behavior, Insect physiology. This article is to correct an error found in *Tetrahedron Letters* (33):3191-3194, 1967.
- 164-69**
A MATHEMATICAL MODEL FOR TWO TRIBOLIUM POPULATIONS IN COMPETITION.
 N W Taylor
Ecology 49(5,SUMMER):843-848 REF
 1968 410 EC7
 Insect behavior, Mathematics, Models, Population, *Tribolium*.
- 165-69**
OBSERVATIONS AND STUDIES ON EX-TOMOPHAGOUS FUNGI IN HUNGARY. (FR)
 G Ubrizsy J Voros
Entomophaga Mem Hors Ser (2):125-128
 1964 421 EN835M
 Biological control (pests), Entomogenous fungi, *Hyphantria cunea*, Insect diseases, *Leptinotarsa decemlineata*. English summary.
- 166-69**
A DEFENSE MECHANISM IN ONYCHIURUS (COLLEMBOLA, ONYCHIURIDAE).
 M B Usher R A Balogun
Entomol Mon Mag 102(1229-1231):237-238
 Oct 1966 421 EN86
 Collembola, Insect behavior, Insect tropism, *Onychiuridae*, Predaceous mites, *Veigaia*.
- 167-69**
APPLICATION OF BETA-PROPIOLACTONE ON THE REARING OF THE SILKWORM, BOMBYX MORI L. (JA)
 S Utsumi M Kitano M Onishi K Kurisu C Yamaguchi Y Ichikawa
J Sericult Sci Jap 37(3):207-212
 Jun 1968 425.9 SE6
 Antiseptics, Biochemistry, *Bombyx mori*, Hydracrylic acid beta-lactone, Insect diseases, Insect physiology, Insect rearing, Microorganisms, Spraying.
- 168-69**
CULTURES OF INSECT TISSUES WITH THE AID OF MAMMALIAN SERUM. (FR)
 C Vago S Chastang
Entomophaga 7(2):175-179
 1962 421 EN835
 Lepidoptera, Mammals, Reproductive organs, Serum, Tissue culture. English summary.
- 169-69**
ELECTRON MICROSCOPIC STUDY OF THE INTRACELLULAR RICKETTSIA PATHOGENESIS USING MELOLONTHA MELOLONTHA L. (FR)
 C Vago O Croissant
Entomophaga 5(4):271-283 REF
 1960 421 EN835
 Electron microscopes, Insect biology, *Melolontha melolontha*, Research, *Rickettsial* diseases.
- 170-69**
THE EFFECT OF BIOCLIMATE ON THE COMMUNICATION SYSTEM OF NIGHT-FLYING MOTHS.
 V J Valli P S Callahan
Int J Biometeorol 12(2):99-118 REF
 May 1968 340.8 IN8
 Carbon dioxide, Climate, Communications, Infrared rays, Insect anatomy, Insect biology, Insect flight, Light traps, Moths, Ozone, Radiation, Temperature. German and French summary
- 171-69**
ELECTROPHORETIC SEPARATION OF THE HEMOLYMPH PROTEINS IN THE SILKWORM, BOMBYX MORI L., INFECTED WITH THE NUCLEARPOLYHEDROSES VIRUS. (JA)
 H Watanabe R Kobara M Hosaka
J Sericult Sci Jap 37(4):319-322
 Aug 1968 425.9 SE6
Bombyx mori, Electrophoresis, Fat body, Insect diseases, Insect physiology, Polyhedroses, Proteins, Viruses. English summary.
- 172-69**
RESPONSES OF APHIDS TO PRESSURE APPLIED TO LIQUID DIET BEHIND PARAFILM MEMBRANE LONGEVITY AND LARVIPOSITION OF MYZUS PERSICAE (SULZ.) AND BREVICORYNE BRASSICAE (L9) (HOMOPTERA: APHIDIDAE) FEEDING ON SUCROSE AND SINIGRIN SOLUTIONS.
 C H Wearing
New Zealand J Sci 2(1):105-121, REF
 Mar 1968 514 N482
Brevicoryne brassicae, Diet, Feeders, Feeding, Insect behavior, Larvae, Longevity, *Myzus persicae*, Reproduction, *Sinigrin*, Sucrose.
- 173-69**
PROTOZOAN AND NEMATODE INFECTIONS OF INSECTS. (GE)
 J Weiser
Entomophaga Mem Hors Ser (2):67-75 REF
 1964 421 EN835M
 Infectious diseases, Insect diseases, Nematodes, Parasitism, Protozoa. English summary
- 174-69**
INFECTIOUSNESS OF COCCIDIANS FOR INSECTS. (GE)
 J Weiser
Entomophaga Mem Hors Ser (2):105-107
 1964 421 EN835M
Adelina tribolii, *Ephestia*, *Galleria*, Insect diseases, Larvae, *Tenebrio*, *Tribolium*. English summary.
- 175-69**
COMPARATIVE SUSCEPTIBILITY OF LEPIDOPTEROUS LARVAE TO BACILLUS THURINGIENSIS BERLINER.
 C A White J D Briggs
Entomophaga Mem Hors Ser (2):305-308
 1964 421 EN835M
Bacillus thuringiensis, Biological control (insects), Dosage, Larvae, Lepidoptera, Mortality. French summary.
- 176-69**
THE BIOCHEMISTRY OF SUGARS AND POLYSACCHARIDES IN INSECTS.
 G R Wyatt
Advances Insect Physiol 4:287-360 REF
 1967 420 AD9
 Biochemistry, Biosynthesis, Carbohydrates, Glycerol, Glycogen, Glycoproteins, Hormones, Insect metabolism, Insect physiology, Polysaccharides, Sugars.
- 177-69**
A CONTRIBUTION TO THE STUDY OF THE MODE OF ACTION OF BACILLUS THURINGIENSIS BERLINER IN REGARD TO THE FLOUR MOTH ANAGASTA (EPHESTIA) KUEHNIELLA ZELLER (LEPIDOPTERA). (FR)
 C Yamurias
Entomophaga 7(2):101-159 REF
 1962 421 EN835

Anagasta kuehniella, Bacillus thuringiensis, Bacteria, Culture media, Insect diseases, Insect physiology, Lepidoptera, Toxins. English summary.

178-69

THE STUDIES OF THE BEHAVIOR OF CULEX PIPIENS FATIGANS WITH SPECIAL REFERENCE TO DISPERSAL, MATING AND FEEDING.

M Yasuno C Harinasuta

Jap J Exp Med 37(6):525-534 REF

Dec 1967 448.8 J272

Culex pipiens quinquefasciatus, Feeding, Insect behavior, Insect dissemination, Reproduction.

179-69

THE SUSCEPTIBILITY OF VARIOUS SPECIES OF MOSQUITOES TO DDT AND DIELDRIN IN THAILAND.

M Yasuno Y Kerdipibule

Jap J Exp Med 37(6):563-579

Dec 1967 448.8 J272

Culicidae, Dieldrin, DDT, Insecticide resistant insects.

180-69

THE BIOLOGY OF COPTOPTERYX GAYI (BLANCHARD) (MANTODEA). (SP)

S Zapata

Chile Univ Centro Estud Entomol Publ (6):45-58

1964 420 C432

Coptopteryx gayi, Insect biology. English summary.

GENETICS

181-69

THE DEVELOPMENT OF THE SEROSA IN MALE EMBRYOS OF THE MEALY BUG, PSEUDOCOCCUS OBSCURUS ESSIG.

A A Bregman

J Exp Zool 169(2):173-189 REF

Oct 1968 410 J825

Cells, Chromosomes, Embryology, Insect genetics, Pseudococcus obscurus, Ultraviolet rays, X-rays.

182-69

GENETIC RESISTANCE OF THE SILKWORM, BOMBYX MORI L., TO AN INFECTION OF A FLACHERIE VIRUS. (JA)

T Funada

J Sericult Sci Jap 37(4):281-287

Aug 1968 425.9 SE6

Bombyx mori, Breeding, Flacherie, Immunity, Insect diseases, Insect genetics, Viruses. English summary.

183-69

MITE CHROMOSOMES; AN EXCEPTIONALLY SMALL NUMBER.

J H Oliver B C Nelson

Nature 214(5090):809

20 May 1967 472 N21

Chromosomes, Harpyrhynchus, Insect eggs, Insect genetics, Insects, Mites, Morphology, Research.

184-69

FENETIC STUDY OF A MUTATION MODIFYING THE SENSITIVITY OF A LAMBDA PHAGE TO IMMUNITY. (FR)

L H Reira Da Silva F Jacob

Inst Pasteur Ann 115(2):145-158 REF

Aug 1968 448.3 AN75

Bacteriophages, Chromosomes, Genetics, Immunity, Mutation, Tables (data), Viruses. English summary.

MEDICAL ENTOMOLOGY

185-69

MEDICAL PARASITOLOGY AND EXOTIC PATHOLOGY. (FR)

H Harant

301P PARIS, LIBRAIRIE MALOINE

1963 RC119.H3 1963

Hematologic diseases, Infectious diseases, Medical entomology, Parasites, Parasitology, Virus diseases.

186-69

PROBLEMS OF PUBLIC HEALTH AND MEDICAL ENTOMOLOGY. (IT)

M Mariani

Accad Naz Ital Entomol Atti 10:96-104

1962 420 AC2

Arthropoda, Epidemiology, Insect control, Insect vectors, Insecticides, Medical entomology, Public health. English summary.

187-69

PYRETHRUM AS AN INSECT REPELLENT. III. A STUDY OF THE PERSISTENCE OF PYRETHRINS FILMS, WHEN APPLIED IN THREE TYPES OF FORMULATION, AS INSECT REPELLENTS TO HUMAN SKIN.

N K Sylvester A J S Weaving

Pyrethrum Post 9(2):8-14

Oct 1967 421 P99

Aedes aegypti, Chromatography, Formulations, Humans, Insect repellents, Insect vectors, Pyrethrum, Skin, Time.

CROP PROTECTION

188-69

SORGHUM ON THE MOVE.

B Barksdale

Farin Quart 23(6,WINTER):64-67,90-91

1969 6 F22995

Crop rotation, Geography, Plant breeding, Sorghum.

189-69

OFFICIAL REGISTER OF PLANT PROTECTION PREPARATIONS- AND EQUIPMENT 1968. (GE)

Pflanzenarzt 21(1):46P

Feb 1968 464.9 P482

Equipment, Legislation, Pesticides, Plant protection, Tables (data).

190-69

OFFICIAL REGISTER OF PLANT PROTECTION PREPARATIONS- AND EQUIPMENT 1967. (GE)

Pflanzenarzt 20(1):44P

Feb 1967 464.9 P482

Equipment, Legislation, Pesticides, Plant protection, Tables (data).

191-69

68TH ANNUAL REPORT OF THE BUREAU OF SUGAR EXPERIMENT STATIONS.

Queensland Bur Sugar Exp Sta Ann Rep 68:96P

MAP

1968 65.9 Q3

Agronomy, Engineering, Entomology, Plant breeding, Plant diseases, Reports, Soils, Sugarcane.

192-69

AN APPRAISAL OF HIGH MEDIUM AND LOW VOLUME METHODS OF SPRAY APPLICATION.

J B Byass

Plant Protect Abs 4:206

Sep 1968 241.75 P69

Pesticides, Plant protection, Spraying. Pans, vol. 14, no.2, May 1968, p.249-255.

193-69

PHOTOCHEMICAL AND EXHAUST FUME DAMAGE TO PLANTS.

E F Darley O C Taylor J T Middleton

Plant Protect Abs 4:191

Sep 1968 241.75 P69

Exhaust gases, Fumes, Photochemistry, Plant injuries. First International Congress of Plant Pathology, London 14-26 July, 1968.

194-69

HOW TO PRODUCE HIGH YIELDS.

S K Dutta

Tocklai Exp Sta Newslett 14(3):101-107

Sep 1967 68.18 T93

Agricultural productivity, Crop yields, Heliophobous plants, Insect pests, Light, Nurseries, Plant diseases, Planting, Pruning, Soils, Tea, Tillage, Water.

195-69

PLANT PROTECTION AND THE ECONOMIC POSITION OF FARMING. (GE)

H Fischer

Gesunde Pflanzen 20(1):1-4

Jan 1968 464.8 G33

Agricultural economics, Crop yields, Plant protection, Plants.

196-69

THE OCCURRENCE OF THE IMPORTANT CAUSES OF DAMAGE TO CULTIVATED PLANTS IN AUSTRIA DURING 1967. (GE)

G Glaeser

Pflanzenschutzberichte 37(4/6):67-85

Mar 1968 464.9 P48

Crop losses, Crops, Insect pests, Plant diseases, Weather. English summary. most important damage causing diseases and insects are listed.

197-69

ANNUAL PLANT PROTECTION REPORT 1966. (GE)

G Glaeser

Pflanzenarzt 20(5):49-50

01 May 1967 464.9 P482

Plant protection, Reports.

198-69

TIMBER. TETrameLES NUDIFLORA R., RESISTANT TO TEREDID BORERS IN BOMBAY HARBOUR.

A A Karande

Nature 213(5071):105

07 Jan 1967 472 N21

Larvae, Marine borers, Plant pest resistance, Research, Teredo, Timber, Wooden pilcs.

199-69

GIBBERELLIN A23 IN IMMATURE SEEDS OF LUPINUS LUTEUS.

K Koshimizu H Fukui M Inui Y Ogawa T Mitsui

Tetrahedron Lett 9:1143-1147

Feb 1968 385 T29

Chemical structure, Gibberellins, Lupinus luteus, Plant hormones, Plant regulators, Seeds.

200-69

MYCOLOGICAL STROLLS. (FR)

M Le Gal

390P REF PARIS, J-B. BAILLIERE ET FILS

1967 QK617.L4

Mushrooms, Mycology.

201-69

CURRENT LITERATURE XIX: AN ANNOTATED BIBLIOGRAPHY.

D Leatherdale

Marcellia 34(2):109-115

Jun 1967 421 M33

Bacteria, Bibliography, Gall-making insects, Plant galls.

202-69

CITRUS CULTURE.

E A Manuel D J Moore J H Jones

Bermuda Dep Agr Bull (36):30P

Jan 1967 8 B45B

Citrus, Citrus nurseries, Containers, Fertilizers, Insects, Mites, Plant diseases, Plant propagation, Planting.

203-69

THE EFFECT OF MUCIN ON THE AMINO ACID ABSORPTION IN THE RAT INTESTINE. (JA)

T Nagasawa M Maeda M Niyomura I Kiyosawa

Jap Soc Food Nutr J 20(4):328-331

Feb 1967 389.9 J27

Absorption (biological), Amino acids, Assay, Biochemistry, Intestines, Mucins, Rats, Research, Temperature.

204-69

FIRST REPORT OF THE REGULAR LIMNOLOGICAL SURVEY OF LAKE BIWA (OCT. 1965-DEC. 1966) II. PLANKTON IN GENERAL AND PHYTOPLANKTON.

K Negoro

Kata Univ Fac Sci Mem Ser Biol (N S)1(1):41-61
Oct 1967 QH301.K9

Aquatic plants, Limnology, Plankton, Reports, Surveys, Time.

205-69

APPLICATION OF INSECTICIDES TO PADDY WATER FOR MORE EFFECTIVE RICE PEST CONTROL.

M D Pathak

10(6,NOV-DEC):12-17
1968

Chemical control (pests), Control equipment, Foliar application, Insecticide application, Rice, Spraying, Water treatment.

206-69

CONTAINER GROWING. CHAPTER 22: INSECTS AND DISEASES.

J M Patterson

Amer Nurseryman J 128(11):9,77-78

01 Dec 1968 80 AM371

Blight, Chemical control (insects), Chemical control (plant diseases), Containers, Fungicides, Insect pests, Insecticides, Juniperus, Plant diseases, Plant physiology, Plant protection, Roots.

207-69

OBSERVATIONS ON BLUE-STAIN AND PIN-HOLE BEETLES AND THEIR CONTROL, IN UNPEELED LOGS OF PINGS CARIBAEA IN TRINIDAD.

R G Pawsey

Commonwealth Forest Rev 47(133):211-224

Sep 1968 99.8 EM72

Blue stain (coniferae), Diplodia natalensis, Fungus diseases (plants), Pinus caribaea, Plant pest control, Xyleborus affinis.

208-69

SAMPLING PESTS AND DISEASES OF TEA: III.

A R Sarkar

Tocklai Exp Sta Newslett 14(3):129-132

Sep 1967 68.18 T93

Agricultural economics, Crop losses, Equipment, Insect pests, Plant diseases, Plant protection, Tea.

209-69

POLLINATION WITH THE SPRAY APPARATUS.

M Saure

Plant Protect Abs 4:195

Sep 1968 241.75 P69

Fruit, Pollination, Spraying equipment. Mitt. Obst Versuchsringes, Jork, 1967, 22:219-23.

210-69

FORTY YEARS OF PEST CONTROL WORK. (GE)

G Schulze

Prakt Schadlingsbekampfer 19(3):30-31

Mar 1967 421 P882

Agricultural history, Pest control, Reviews.

211-69

PESTS ARE ENDANGERING OUR CULTIVATED PLANTS. (GE)

K Schumann T Wetzell

184P LEIPZIG, VEB FACHBUCHVERLAG
1962 SB953.S3

Bacterial diseases (plants), Biological control (pests), Chemical control (pests), Fungicides, Fungus diseases (plants), Herbicides, Insect pests, Insecticides, Plant diseases, Plant nematodes, Plant protection, Rodent control, Spraying, Storage diseases, Virus diseases (plants).

212-69

SPECIAL PREPARATIONS RECOGNIZED BY THE STATENS FORSOGSVIRKSOMHED I PLANTEKULTUR FOR CONTROL OF PLANT DISEASES AND PESTS. (DA)

Niilaan and Lydiche, Capenhagen, Denmark 32P.
1964 464.4 D41

Chemical control (insects), Chemical control (plant diseases), Pesticides.

213-69

SOME IMPACTS OF BEEKEEPING ON THE MANAGEMENT OF THE MIOMBO IN TANZANIA.

P V Tesha

Commonwealth Forest Rev 47(133):238-242 REF

Sep 1968 99.8 EM72

Apiculture, Bees, Forestry, Forests, Trees.

214-69

DEFOLIATION IN VIETNAM.

F H Tschirley

Science 163(3869):779-786 REF

21 Feb 1969 470 SC12

Animals, Climate, Defoliation, Ecology, Forests, Herbicides, Plants, Population, Soils.

215-69

THE EFFECT OF TEMPERATURE AND FUMIGATION ON THE NITRIFICATION RATE IN SOIL.

D W Wilson

Sail Conserv Soc Amer Prac 22:129-131 REF

13 Aug 1967 56.9 SO33P

Fumigation, Nitrification, Research, Soil analysis, Soil texture, Temperature.

DISEASES

216-69

THE GYPSY MOTH THREAT IN AMERICA.

Agrichem West 11(9):13-14

Sep 1968 381 AG85

Aerial spraying, Biological control (insects), Carbaryl, Chemical control (insects), DDT, Epidemiology, Hardwoods, Insect morphology, Porthetria dispar, Research, Trees.

217-69

VARIETAL RESISTANCE TO CLOVER ROT IN WHITE CLOVER.

D T A Aldrich D A Doling

Nature 214(5059):946-947

27 May 1967 472 N21

Clover, Crops, Fungus diseases (plants), Plant disease resistance, Plant physiology, Research, Rot, Sclerotinia trifoliorum, White clover.

218-69

VARIATION IN THE HOST-PARASITE RELATIONSHIP OF A CROP DISEASE.

M H Arnold S J Brown

Empire Cotton Grawing Carp Res Mein (71):19-36 REF

1968 72.9 EM7R

Bacterial diseases (plants), Blight, Cotton, Crop varieties, Host indexing (plants), Parasitism, Plant disease resistance, Plant genetics, Regression analysis, Xanthomonas malvacearum.

219-69

PARTIAL PURIFICATION OF SUGARCANE MOSAIC VIRUS BY FILTRATION THROUGH GEL. (FR)

P Baudin G Larbaight A Dodin

Inst Pasteur Ann 115(2):288-296

Aug 1968 448.3 AN75

Extracts, Filters, Gels, Mosaic, Purification, Sugarcane, Ultraviolet rays, Virus diseases (plants). English summary.

220-69

IS ERGOT INFECTION UNIMPORTANT. (GE)

A Becker

Gesunde Pflanzen 19(3):41-44

Mar 1967 464.8 G33

Agricultural economics, Claviceps purpurea, Crop losses, Fungus diseases (plants), Plant diseases.

221-69

THE BORON STATUS OF DECIDUOUS FRUIT AS REFLECTED BY LEAF AND FRUIT COMPOSITION.

E Beyers W J Pienaar

Deciduous Fruit Grower 18(PT 5):142-146 REF

May 1968 80 D35

Boron, Deficiency diseases, Fruit, Leaves, Plant composition, Plant nutrition.

222-69

HINDSIGHT AND FORESIGHT CAN CONTROL COTTON SEEDLING DISEASE.

L S Bird

Cotton 4(6):16,26

Jun 1968 72.8 C8225

Chemical control (plant diseases), Cotton, Fungicides, Fungus diseases (plants), Seed treatment, Seedlings, Temperature.

223-69

PROTECTION AGAINST VIRUS DISEASES, AN ESSENTIAL ASPECT OF MAINTENANCE BREEDING IN FRUIT GROWING IN CZECHOSLOVAKIA. (GE)

C Blattny B Zimandl

Klostbgr Haheeren Bund- Vers Wien- Ovst Mit Ser A. Rebe Wein 17(2):146-153 REF

Mar 1967 105.9 K696

Breeding, Fruit, Plant disease control, Plant protection, Virus diseases (plants). English, French, and Spanish summaries.

224-69

POSSIBILITIES AND LIMITS OF VISUAL SELECTION IN THE CONTROL OF THE VIRUS DISEASES OF GRAPEVINES: AN EXPERIENCE WITH SOME RED VARIETIES IN THE SWISS ROMAND. (FR)

R Bovey H Leyuraz F Pelet J-I Pitton J-I Simon

Switzerland Stat Essais Agr Lausanne Publ 366-374 REF

1967 105.5 SW63

Crop varieties, Diagnosis, Economics, Grapes, Serological tests, Thermotherapy, Virus diseases (plants), Visual classification. Reprint from Vitis.

225-69

TRITICALE IN 1967.

E N Carter

Northwest Crop Produc Canf Rep 1967

MEETING:14-20

1967 464.9 N813

Plant breeding, Plant disease resistance, Rye, Time, Triticale, Wheat, T. hexaploid is a new crop, a hybrid between wheat and rye.

226-69

COFFEE BERRY DISEASE.

C I Critchett L M Fernie

Tanganyika Coffee News 8(1,JUL-SEP):17-19

1967 68.28 T15

Coffee, Coffee berry disease, Fungus diseases (plants), Plant breeding, Pruning, Spraying.

227-69

METHODS CONCERNING THE DETERMINATION OF THE EFFECTIVENESS OF INSECTICIDES AGAINST THE EUROPEAN CORN BORER (OSTRINIA (PYRAUSTA) NUBILALIS HBN.) WITH SMALL CONTROL TESTS AND AERIAL CHEMICAL APPLICATIONS. (GE)

T Djulizibabic

Pflanzenschutzberichte 38(3/4):47-56 REF

Jun 1968 464.9 P48

Aerial spraying, Chemical control (pests), Corn, Crop losses, Insecticides, Ostrinia nubilalis, Tables (data). English summary.

228-69

TEMPTING THE SOYBEAN'S ERRATIC APPETITE.

W Evans

Farm Quart 23(6,WINTER):72.9, 94

1969 6 F22995

229-69

Fertilizers, Nitrogen, Nutrient solutions (plants), Phosphorus, Plant nutrition, Potassium, Soybeans.

229-69

THE FACTORS DETERMINING THE EFFICACY OF BIOLOGICAL PREPARATIONS IN PLANT PROTECTION. (FR)

N S Fedorintchik

Entomophaga Mem Ilors Ser (2):51-61 REF

1964 421 EN835M

Biological control (pests), Biological products, Culture media, Insect physiology, Integrated control (insects), Plant protection. English summary.

230-69

FIREBLIGHT: A DISEASE WE DON'T WANT.

G W Gayford

Victorian Hort Dig 12(4,NOV-JAN):7-8

1969 80 V662

Apples, Bacterial diseases (plants), Erwinia amylovora, Fire blight, Pears, Plant protection, Plant quarantine.

231-69

VERTICILLIUM WILT IN THE TOMATO CULTURES OF THE VALAIS. (FR)

D Gindrat

Switzerland Stat Essais Agr Lausanne Publ (790):3-7 REF

Oct 1967 105.5 SW63

Chemical control (plant diseases), Chloropicrin, Crop rotation, Diagnosis, Fungus diseases (plants), Methyl bromide, Plant disease control, Soil sterilization, Tomatoes, Verticillium albo-atrum, Wilt. Extract from Swiss Horticultural Review 40(10):320-325, 1967.

232-69

DIDYMELLA BRYONIAE, A NEW FUNGUS PARASITE OF CUCUMBER CULTURES. (FR)

D Gindrat A Bolay

Switzerland Stat Essais Agr Lausanne Publ (776):4P

Dec 1966 105.5 SW63

Cucumbers, Diagnosis, Didymella bryoniae, Fungus diseases (plants), Heat, Parasitism, Seedlings, Soil sterilization, Temperature. Extract from Swiss Horticulture Review, 39(12):371-375, 1966.

233-69

CONTROL OF POST-HARVEST DECAY AND THE INFLUENCE OF POSTHARVEST TREATMENTS ON DECAY IN CLINGSTONE PEACHES.

A J Heyns H D Erasmus W F S Schwabe

Deciduous Fruit Grower 18(PT 5):146-147

May 1968 80 D35

Fungus diseases (plants), Harvesting, Monilinia fructicola, Peaches, Plant protection, Rhizopus nigricans, Rot.

234-69

CORALLOID ROOT SYSTEMS IN PLANTS SHOWING LIME INDUCED CHLOROSIS.

T C Hutchinson

Nature 214(5059):943-945 REF

27 May 1967 472 N21

Chlorosis, Leaves, Lime, Plant grafting, Plant metabolism, Plant nutritional deficiencies, Plant translocation, Research, Roots, Soils.

235-69

ON THE OCCURRENCE AND TREATMENT OF ACTINOBACILLOSIS IN CATTLE. (CZ)

J Hybásek D Pichová J Picha

Czech Min Zemed Les Hospod Ustav Vedeckotech Inform Vet Med 13(1):25-30 REF

Jan 1968 41.9 C333

Actinobacillosis, Bacterial diseases (animals), Blood serum, Cattle, Chemical control (animal diseases), Drug therapy, Injections, Iodine, Proteins. English, Russian, and German summaries.

236-69

PHYSIOLOGIC RACES OF PUCCINIA RECONDITA F. SP. TRITICI IN THE UNITED STATES FROM 1926 THROUGH 1960.

C O Johnston R M Caldwell L E Compton L E

Browder

U S D A Tech Bull 1393:18 P.

Jun 1968 1 AG84TE

Epidemiology, Fungus diseases (plants), Leaf rust (wheat), Plant physiology, Plant taxonomy, Puccinia recondita, Research, Tables (data).

237-69

CONTROL OF RACE 2 FUSARIUM OF TOMATOES.

J P Jones S S Woltz

Sunshine State Agr Res Rep 13(5-6,SEP-NOV):8-9

1968 100 F66SU

Deficiency diseases, Fungus diseases (plants), Fusarium oxysporum lycopersici, Microorganisms, Plant disease control, Plant protection, Research, Soil sterilization, Tomatoes, Wilt.

238-69

THE INFLUENCE OF HERBICIDES ON THE INCIDENCE OF DISEASE WITH PARTICULAR REFERENCE TO TEMPERATE FRUIT CROPS.

T Kavanagh

Plant Protect Abs 4:190

Sep 1968 241.75 P69

Biochemistry, Environment, Fruit, Herbicides, Plant diseases. First International Congress of Plant Pathology, London 14-26 July, 1968.

239-69

A NOTE ON THE ISOLATION AND CHEMICAL CHARACTERISTICS OF ANTIFUNGAL AGENTS FROM EXTRACTS OF ANAGALLIS ARVENSIS L.

S G S Khanna Y L Nene C K Banerjee P N

Thapliyal

Indian Phytopathol 20(1):64-66

Mar 1967 464.8 IN2

Anagallis arvensis, Colletotrichum papayae, Fungicides.

240-69

STATUS OF SEED TREATMENT FOR BARLEY SMUT CONTROL.

R L Kiesling

Northwest Crop Produc Conf Rep 1967

MEETING:7

1967 464.9 N813

Barley, Fungus diseases (plants), Loose smut, Pest control, Seed treatment.

241-69

SPRUCE GALLS IN WISCONSIN.

C Koval

Amer Nurseryman J 128(11):76-77

01 Dec 1968 80 AM371

Aphididae, Feeding, Picea, Plant diseases, Plant galls.

242-69

DIRECTIONAL GROWTH OF THE UREDIOSPORE GERM TUBES AND STOMATAL PENETRATION.

R Maheshwari A C Hildebrandt

Nature 214(5093):1145-1146

10 Jun 1967 472 N21

Antirrhinum majus, Electron microscopy, Fungus diseases (plants), Leaves, Plant physiology, Puccinia antirrhini, Reproduction, Stomata, Tissues.

243-69

REDISTRIBUTION OF 45CA IN TRIFOLIUM SUBTERRANEUM L AND ANTIRRHINUM MAJUS L.

C R Millikan B C Hanger

Australian J Biol Sci 20(6):1119-1130 REF

Dec 1967 442.8 AU72

Antirrhinum, Calcium isotopes, Radioactive tracers, Subterranean clover.

244-69

THE DETECTION OF PRIMARY INFECTIONS OF VIRUS DISEASES IN POTATO PLANT CULTURES. (FR)

J Muenster P Cornu

Switzerland Stat Essais Agr Lausanne Publ 235-

236

1966 105.5 SW63

Crop losses, Diagnosis, Plant disease transmission, Potatoes, Virus diseases (plants). Reprint of Third Triennial Conference EAPR (1966), Proceedings.

245-69

DECAY OF RUBBER WOOD IN A REPLANTING AND ITS EFFECT ON ROOT DISEASE.

A Newsam K P John B S Rao

Rubber Res Inst Malaya J 20(PT 1):1-7

1967 78.9 R824J

Herbicides, Hevea brasiliensis, Plant diseases, Poisoning, Roots, Sodium arsenite, T, 2,4,5-, Wood decay.

246-69

PHYSIOLOGICAL RACES OF PUCCINIA STRIFORMIS IN THE WHEAT OF IRAN. (GE)

E Niemann G Scharif A Bamdadian

Iran Inst Rech Entomol Phytopathol Entomol

Phytopathol Appl (26):17-21

Nov 1967 464.9 P432

Fungus diseases (plants), Plant physiology, Puccinia glumarum, Puccinia striiformis, Tables (data), Wheat. English summary. persian translation.

247-69

THE SUSCEPTIBILITY OF SOME CULTIVATED PLANTS TO SCLEROTIUM ROLFII SACC. (GE)

E Niemann G Scharif A Mirkamali

Iran Inst Rech Entomol Phytopathol Entomol

Phytopathol Appl (26):22-26

Nov 1967 464.9 P432

Crops, Fungus diseases (plants), Plant disease resistance, Sclerotium rolfsii, Tables (data), Vegetables. English summary. persian translation.

248-69

THE EFFECT OF SOWING DATES ON THE REACTIONS OF SIX WHEAT STRAINS TO STEM RUST.

B P Patil

Indian Phytopathol 20(1):45-49

Mar 1967 464.8 IN2

Dates, Stem rust, Wheat.

249-69

LINDANE: METABOLISM TO A NEW ISOMER OF PENTACHLOROCYCLOHEXENE.

W T Reed A J Forgash

Plant Protect Abs 4:201

Sep 1968 241.75 P69

Biochemistry, Chlorinated hydrocarbons, Cyclohexenes, Isomerism, Lindane, Metabolites, Musca domestica. Science, vol. 160, June 14, 1968 p.1232.

250-69

RECOMMENDATIONS FOR CHEMICAL TREATMENT OF DISEASES OF HEVEA.

Rubber Res Inst Malaya Plant Bull (96):96-99

May 1968 78.9 R825

Chemical control (plant diseases), Dosage, Fungicides, Fungus diseases (plants), Gloeosporium, Hevea, Odium, Pesticide application, Phytophthora.

251-69

DIEBACK.

Rubber Res Inst Malaya Plant Bull 90:107-111

May 1967 78.9 R825

Deficiency diseases, Dieback, Fungus diseases (plants), Microorganisms, Plant disease control, Plant injuries, Pruning, Rubber.

252-69

PHYTOPHTHORA LEAF FALL AND POD ROT.

Rubber Res Inst Malaya Plant Bull 90:99-106

May 1967 78.9 R825

Aerial spraying, Crop losses, Diagnosis, Environment, Phytophthora, Plant disease control, Rubber.

- 253-69**
CONTROL OF LETTUCE LEAF DROP BY SOIL DRENCHING WITH FUNGICIDES.
 M L Sahni S R Dohre
Indian Phytopathol 20(1):69-71
 Mar 1967 464.8 IN2
 Fungicides, Leaf drop (lettuce), Lettuce, Sclerotinia, Soils.
- 254-69**
SAMPLING PESTS AND DISEASES OF TEA. II.
 A R Sarkar
Tocklai Exp Sta Newslett 14(2):72-75
 Jun 1967 68.18 T93
 Climate, Environment, Plant diseases, Soil conservation, Soil series, Tea, Tetranychidae, Zoogeography.
- 255-69**
PROBLEMS OF FUNGICIDAL EFFICIENCY.
 G Satyanarayana
Tocklai Exp Sta Newslett 14(3):123-124
 Sep 1967 68.18 T93
 Chemical control (plant diseases), Copper, Fungi, Fungicides, Nickel, Plant protection, Soils.
- 256-69**
OAT DISEASES AND THEIR CONTROL.
 M D Simons H C Murphy
U S D A Agr Handb (343):15P
 Nov 1968 1 AG84AH
 Bacterial diseases (plants), Fungus diseases (plants), Handbooks, Illustrations, Oats, Plant disease control, Plant nutritional deficiencies, Virus diseases (plants). 23 specific oat diseases are discussed.
- 257-69**
MANGANOUS OXIDE (MNO) AS A FERTILIZER FOR CONTROLLING MANGANESE DEFICIENCY IN OATS.
 K W Smilde
Neth J Agr Sci 16(3):197-203 REF
 1968 12 N3892
 Deficiency diseases, Manganese, Manganese oxides, Oats, Plant nutrition.
- 258-69**
PLANT INSPECTION AND WHAT IT ENTAILS.
 D Thomas G M Thomson
S Afr Sugar J 52(6):527,529
 Jun 1968 65.8 SO8
 Biological control (plant diseases), Inspection (agricultural products), Mosaic, Nurseries, Plant breeding, Plant disease control, Plant diseases, Ratoon stunt, Research, Sugarcane, Surveys.
- 259-69**
RATOON STUNTING DISEASE AND DROUGHT A DISASTROUS COMBINATION.
 G M Thomson
S Afr Sugar J 52(3):201,203
 Mar 1968 65.8 SO8
 Crop losses, Droughts, Heat, Plant diseases, Plant injuries, Ratoon stunt, Seed treatment, Sugarcane.
- 260-69**
BACTERIAL STRIPE BLIGHT OF OATS CAUSED BY PSEUDOMONAS STRIAFACIENS (ELLIOTT) STARR ET BURKHOLDER. (JAP)
 T Tominaga K Nishiyama
Jap Soc Grassland Sci J 14(1):51-55 REF
 Apr 1968 60.9 J27
 Agar, Bacterial diseases (plants), Biochemistry, Chemical control (plant diseases), Epidemiology, Hydrogen-ion concentration, Leaves, Oats, Pseudomonas striaefaciens, Stripe, Temperature. English summary.
- 261-69**
HOW FUNGI INFECT STORED GRAINS.
 J Tuite
Grain Feed J 126(1):9
 08 Jan 1969 298.8 G762
 Agricultural products, Aspergillus flavus, Economics, Fungus diseases (plants), Gibberella zeae, Grain, Microbiology, Penicillium rubrum, Storage diseases.
- 262-69**
SOME FACTS ABOUT FUNGICIDES.
 B H Vine
Kenya Coffee 33(392):293-296
 Sep 1968 68.29 C652
 Coffee, Coffee berry disease, Fungicides, Fungus diseases (plants), Spraying, Storage, Toxicity.
- 263-69**
HEAT PASTEURIZATION AND CHEMICAL FUNGICIDES FOR CONTROL OF FUSARIUM ROT OF CALIFORNIA CANTALOUPS.
 J M Wells J K Stewart
Plant Protect Abs 4:207
 Sep 1968 241.75 P69
 Cantaloupes, Chemicals, Fungicides, Fungus diseases (plants), Fusarium roseum, Fusarium solani, Heat, Pasteurization, Rot. Plant Disease Reporter, vol. 52, no.4, April 1968, p.262.
- 264-69**
RESISTANCE POWER OF THE AUSTRIAN WINTER WHEAT ASSORTMENT AGAINST DWARF BUNT (TILLETIA CONTROVERSA KUHN). (GE)
 B Zwatz
Pflanzenschutzberichte 36(3/4):45-55 REF
 Sep 1967 464.9 P48
 Antiseptics, Fungus diseases (plants), Resistance, Seed treatment, Soil treatment, Tilletia controversa, Wheat. English summary.

ARTHROPODS

- 265-69**
ULTRASOUND TO STOP THE MOTHS SETTLING.
Plant Protect Abs 4:192
 Sep 1968 241.75 P69
 Insect behavior, Insect pests, Moths, Plant protection, Sound waves. New Scientist, vol. 38, no. 597, May 16, 1968, p.347.
- 266-69**
TENDER TRAP. (ABSTRACT).
Aust Tob Growers Bull (12):23
 1968 69.8 AU72
 Insect pests, Insect traps, Plant protection, Tobacco. Abstract from Tobacco Abstracts.
- 267-69**
CHANGES IN THE GROWTH-REGULATOR CONTENT OF PLUM INFESTED WITH FRUIT TREE RED SPIDER MITE, PANONYCHUS ULMI (KOCH).
 D J Avery H J Lacey
J Expt Bot 19(61):760-769 REF
 Nov 1968 450 J8224
 Biochemistry, Extracts, Fruit, Gibberellins, Indoleacetic acid, Insect control, Panonychus ulmi, Plant regulators, Plums.
- 268-69**
LEAF DETERIORATIONS BROUGHT ABOUT BY THE CICADELLA EMPOASCA FLAVESCENS F. (HOM., TYPHLOCYBIDAE) GROWN ON APPLE TREES. (FR)
 M Baggiolini
Switzerland Stat Essais Agr Lausanne Publ 40(3/4):257-262
 15 Apr 1968 105.5 SW63
 Apples, Empoasca flavescens, Fruit, Insect vectors, Leaves, Plant diseases, Tree injuries, Typhlocyba crataegi, Typhlocybae. Reprint from Communications of Swiss Entomological Society.
- 269-69**
THE APPLE MOTH (RECURVARIA LEUCATELLA CL.) A LITTLE KNOWN PEST OF OUR FRUIT TREES. (FR)
 M Baggiolini
Switzerland Stat Essais Agr Lausanne Publ (794):1-4
 Sep 1967 105.5 SW63
 Chemical control (insects), Crop losses, Fruit, Insect biology, Insect pests, Insecticide resistant insects, Insecticides, Recurvaria leucatella, Tree injuries. Extract from Romand Agriculture 6(9)(ser a):111-114, 1967.
- 270-69**
THE NEED FOR CONSERVING NATURAL ENEMIES OF PESTS.
 B Banerjee
Tocklai Exp Sta Newslett 14(3):133-136
 Sep 1967 68.18 T93
 Beneficial insects, Biological control (insects), Insect pests, Parasitism, Plant protection, Tea.
- 271-69**
PEST PROFILES III. - WHITE BORER.
 M Bigger
Tanganyika Coffee News 8(1 JUL-SEP):14-16
 1967 68.28 T15
 Anthores leuconotus, Coffee, Coleoptera, Insect pests.
- 272-69**
A FRUIT PEST IS BEING STERILIZED. (GE)
 H Bohm
Pflanzenarzt 20(5):50
 01 May 1967 464.9 P482
 Ceratitis capitata, Gamma irradiation, Insect control, Insect pests, Plant hosts, Pupae, Radiation, Sterilization (insects).
- 273-69**
INSECT CONTROL ON GOLF GREENS.
 V R Coleman
Southeast Turfgrass Conf Proc 21:46-47
 Apr 1967 60.19 SO86
 Golf courses, Insect biology, Insect control, Insect identification, Insect pests.
- 274-69**
OLD AND NEW ACARIDAE, CITRUS PLANT PARASITES IN ITALY. (IT)
 G Costantino
Accad Naz Ital Entomol Atti 10:154-163 REF
 1962 420 AC2
 Aceria sheldoni, Brevipalpus, Citrus, Hemitarsonemus, Mites, Tetranychus urticae. French summary.
- 275-69**
VIRUS INSECTICIDES.
Aust Tob Growers Bull (12):21
 1968 69.8 AU72
 Insect pests, Insecticides, Plant protection, Tobacco, Viruses.
- 276-69**
RESEARCH YIELDS EASILY APPLIED VIRUS DEADLY TO CODLING MOTH LARVAE.
 L A Falcon
Plant Protect Abs 4:200-201
 Sep 1968 241.75 P69
 Apples, Biological control (insects), Carpocapsa pomonella, Plant protection, Research, Virus diseases (animals). Western Fruit Grower, vol. 22, no. 5, May 1968, p.18.
- 277-69**
TESTS WITH INSECTICIDES FOR THE CONTROL OF RESISTANT MYZUS PERSICAE (SULZER) ON YEAR-ROUND CHRYSANTHEMUMS.
 H J Gould
Plant Protect Abs 4:197
 Sep 1968 241.75 P69
 Chemical control (insects), Chrysanthemum, Insecticide resistant insects, Insecticides, Myzus persicae. Plant Pathology, 17, 88-94, June 1968.
- 278-69**
BIOLOGY OF THE SPINY BOLLWORM. (PE)
 M Haidari
Iran Inst Rech Entomol Phytopathol Entomol Phytopathol Appl (26):31-36
 Nov 1967 464.9 P432
 Cotton, Earias insulana, Insect biology, Insect morphology, Larvae, Tables (data), Temperature.

279-69

INHIBITION BY BLASTICIDIN S OF THE ABILITY OF LEAFHOPPERS TO TRANSMIT RICE STRIPE VIRUS.

T Hirai T Saito H Onda K Kitani A Kiso

Plant Protect Abs 4:207

Sep 1968 241.75 P69

Blasticidin s, Cicadellidae, Insect vectors, Rice, Stripe, Virus diseases (plants). Phytopathology, vol. 58, no. 5, May 1968, p.602.

280-69

OBSERVATIONS ON THE CONTROL OF THE COFFEE BERRY BORER, HYPOTHENEMUS HAMPEI (FERR.), WITH ENDOSULFAN IN UGANDA.

W R Ingram

Plant Protect Abs 4:196-197

Sep 1968 241.75 P69

Chemical control (insects), Coffee, Endosulfan, Hypothenemus hampei. Bulletin of Entomological Research, vol.57, June 1968, p.539-547.

281-69

THE HESSIAN FLY.

H N Lafever R L Gallun J H Hatchett R E Treece

Ohio Rep Res Develop Biol Agr Home Econ

53(4,JUL-AUG):54-55;MAP

1968 100 OH3S (3)

Aging, Hibernation, Insect morphology, Mayetiola destructor, Plant injuries, Plant protection, Surveys, Wheat.

282-69

WHAT HAPPENS WHEN SPRAYS ARE NO LONGER NEEDED FOR CONTROL OF CODLING MOTH.

H Madsen

Plant Protect Abs 4:198-200

Sep 1968 241.75 P69

Apples, Biological control (insects), Carpocapsa pomonella, Insect control, Plant protection, Spraying, Sterility. Western Fruit Grower, vol. 22, no. 5, May 1968, p.13-16.

283-69

CONTROL OF INSECT AND MITE PESTS OF SMALL FRUITS.

J P Miller

Wash State Coll Dept Ext Memo Circ 2913:19P

Jun 1968 275.29 W27MI

Fruit, Insect control, Insect pests, Insecticide application, Insecticides, Mites, Research, Toxicology.

284-69

ETHION A NEW ACARICIDE FOR CONTROL OF RED SPIDER, SCARLET, PINK AND PURPLE MITES.

T D Mukerjee

Tocklai Exp Sta Newslett 14(3):112-122

Sep 1967 68.18 T93

Acaricides, Chemical control (insects), Ethion, Insect eggs, Insect pests, Mites, Plant protection, Tea, Tetranychidae.

285-69

NOTE ON SPHENARCHES ANISODACTYLUS, WKR. DAMAGING BOTTLE GOURD (LAGENERIA LUCANTHA, RUSBY).

H K Patel M S Chari

Andhra Agr J 15(1):25-28

1968 34.2 AN4

Apanteles paludicola, Insect biology, Insect pests, Lageneria sicaria, Parasitic insects, Sphenarches anisodactylus.

286-69

AN OUTLINE OF THE BIOLOGY OF HYP-SIPYLA ROBUSTA MOORE, THE SHOOT BORER OF THE MELIACEAE (MAHOGANIES) OF NIGERIA, TOGETHER WITH BRIEF COMMENTS OF TWO STEM BORERS AND ONE OTHER LEPIDOPTERAN FRUIT BORER ALSO FOUND IN NIGERIAN MELIACEAE.

H Roberts

Commonwealth Forest Rev 47(133):225-232

Sep 1968 99.8 EM72

Biology, Hypsipyla robusta, Insect pests, Lepidoptera, Plant protection, Trees.

287-69

CURRENT STATUS OF CEREAL LEAF BEETLE CONTROL EFFORTS.

G A Taylor

Northwest Crop Produc Conf Rep 1967

MEETING:8-13

1967 464.9 N813

Grain, Insect control, Oulema melanopus.

288-69

THE INFLUENCE OF THE SOWING TIME ON THE INTENSITY OF ATTACK BY THE PANICLE GENERATION OF FRIT FLY (OSCINELLA FRIT L.).

T Tesie

Quahias Plant Water Veg 15(4):341-349

10 Jul 1968 64.8 M41

Barley, Chemical control (insects), Oscinella frit, Seed germination, Seed planting, Tables (data), Temperature, Weather. German and French summary.

289-69

PHYLLXERA: SCOURGE OF THE VINEYARD.

J E Unthank

Victorian Hort Dig 12(4,NOV-JAN):2-6

1969 80 V662

Grapes, Insect control, Phylloxera vitifoliae, Plant breeding, Plant injuries, Plant pest resistance, Plant protection.

290-69

EXTERNAL AND INTERNAL SYMPTOMOLOGY ON VITIS FROM PLANT SUCKING INSECTS. (IT)

C Vidano

Turin Univ Fac Sci Agr Raccolta Mem

14(588,1966-1967):117-136, REF

1967 105.4 T842

Grapes, Homoptera, Leaves, Plant injuries. English summary

291-69

A NOTE ON THE CONTROL OF THE SEMICOOPER, ACHAEA JANATA L., ON CASTOR.

S M Vittal R Saroja

Madras Agr J 55(4):200-202

Apr 1968 22 M262

Achaea janata, Benzene hexachloride, Carbaryl, Carbofenothion, Castorbeans, Chemical control (insects), DDT, Endrin, Imidan, Parathion, Plant protection, Trichlorfon.

292-69

THE METHOD OF TESTING SEED POTATOES BY MEAN OF THE CALLOSE (IGEL-LANGE) TEST. (GE)

H Wenzl

Pflanzenschutzberichte 36(3/4):33-44

Sep 1967 464.9 P48

Callose, Leaf roll, Methodology, Microscopy, Plant disease control, Plant protection, Potatoes, Seed potatoes. English summary

NEMATODES

293-69

THE SUGARBEET NEMATODE. PROBLEMS AND PROGRESS IN ITS CONTROL IN COLORADO.

J Altman

Holly Agr News 16(4,WINTER):14-21

1969 66.8 H72

Crop rotation, Heterodera schachtii, Plant injuries, Plant nematodes, Plant protection, Planting, Soil fumigation, Sugar beets.

294-69

NEMATODES CAN BE CONTROLLED.

M Anders

Amer Dahlia Soc Bull (SER 40)(2):8-9

Jun 1967 81 AM322

Dahlia, Fumigants, Nematocides, Pest control, Plant nematodes, Plant protection, Soil treatment.

295-69

EELWORMS IN TEA: SOME PROBLEMS.

B Banerjee

Tocklai Exp Sta Newslett 14(2):82-83

Jun 1967 68.18 T93

Cover crops, Pest control, Plant injuries, Plant nematodes, Roots, Soil series, Tea, Zoogeography.

296-69

EELWORM IN TEA: SOME IMPORTANT GROUPS.

S D Basu

Tocklai Exp Sta Newslett 14(2):84-85

Jun 1967 68.18 T93

Biology, Feeding, Nematodes, Taxonomy, Tea.

297-69

THE INCREASED ATTACK OF DITYLENCHUS DIPSACI ON ONION CAUSED BY SOME FUNGICIDES.

M W Brzeski W Macias

Plant Protect Abs 4:193

Sep 1968 241.75 P69

Biochemistry, Ditylenchus dipsaci, Fungicides, Nematodes, Onions. Nematologica, 1967, 13:322.

298-69

RELATIVE EFFICACY OF DIFFERENT OIL-CAKES ON THE INCIDENCE OF ROOT-KNOT NEMATODES.

S F Hameed

Madras Agr J 55(4):168-169

Apr 1968 22 M262

Chemical control (nematodes), Meloidogyne, Oil meal, Plant nematodes, Plant protection, Root knot, Vegetables.

299-69

APHELENCHOIDES BICAUDATUS, A PARASITE OF CULTIVATED MUSHROOM.

R W McLeod

Nature 214(5093):1163-1164

10 Jun 1967 472 N21

Aphelenchoides, Crop yields, Mushrooms, Nematodes, Parasitism, Research, Soils, Tables (data).

300-69

NEMATODES OF THE NORTHERN GREAT PLAINS.

G Thorne R B Malek

S Dak Agr Exp Sta Tech Bull 31:111P.

Jul 1968 100 S082 (3)

Chemical control (nematodes), Distribution, Great Plains, Nematodes, Taxonomy.

WEEDS

301-69

CHEMICAL WEED CONTROL.

Anonymous

Com Hort Floristry New Zeal 1(11):298-299

(CONT.)

Jun 1968 SB13.C59

Chemical control (weeds), Herbicides, Leaves, Pesticide application, Plant hardiness, Plant physiology, Plant translocation, Soils, Surface-active agents.

302-69

CHEMICAL CONTROL OF WEEDS IN FIELDS AND IN THE OPEN COUNTRY. (GE)

G Baechthaler R Dieckes

*191P REF MUNICH, BAYERISCHER**LANDWIRTSCHAFTSVERLAG*

1968 SB613.G3B3

Aquatic weeds, Chemical control (weeds), Crops, Herbicides, Pastures, Soil treatment, Spraying.

303-69

USE OF PETROLEUM OILS AND HERBICIDE MIXTURES TO IMPROVE WEED CONTROL PERFORMANCE.

R Behrens

Northwest Crop Produc Conf Rep 1967
MEETING:73-75

1967 464.9 N813

Chemical control (weeds), Field crops, Herbicides, Mineral oil.

304-69

NEW WEED KILLERS BOOST ORCHARD CONSERVATION.

R P Church

Michigan Farmer 250(10):43

16 Nov 1968 6 M58

Amitrole, Chemical control (weeds), Fruit, Herbicides, Simazine, Spraying.

305-69

WEED CONTROL IN CEREALS.

A D Courtney

Agr North Ireland 42(12):398-401

Apr 1968 256.13 AG82M

Chemical control (weeds), Crop yields, Grain, Harvesting date, Herbicides.

306-69

WEED CONTROL FOR THE HOME GARDEN.

Aquatic Weed Control 8:4P

1968 7 B77P

Flowers, Herbicides, Lawns, Ornamental plants, Pesticide application, Vegetables, Weed control.

307-69

AQUATIC WEED CONTROL.

Aquatic Weed Control 7:8P

1968 7 B77P

Aquatic weeds, Chemical control (weeds), Herbicides, Weed control.

308-69

A FIELD TRIAL WITH PHENOXYBUTYRIC HERBICIDES ON TROPICAL FORAGE LEGUMES.

J Foster P J Terry C J Mosha M A Owen R C

Musomi

Arusha Trop Pesticides Res Inst Misc Rep 627,14 P.

Aug 1967 423.92 G7922

Chemical control (weeds), Desmodium, Dichlorophenoxy) butyric acid, 4-(2,4-, Herbicides, Legumes, Methyl-4-chlorophenoxy)butyric acid, 4-(2-.

309-69

A MINIMUM CULTIVATION TRIAL WITH MAIZE USING PARAQUAT HERBICIDE.

J Gordon

Ghana Farmer 12(1):2-5

Feb 1968 24 G564

Chemical control (weeds), Corn, Crop yields, Economics, Herbicides, Paraquat, Plant protection, Tillage.

310-69

EFFECT OF TOPSOIL DEEPENING ON WEED INFESTATION OF FOLLOWING CROPS. (GE)

R Herzog

Albrecht-Thaer-Arch 12(9):839-845 REF

1968 18 AL1

Crop yields, Plowing, Research, Soil horizons, Soil series, Tillage, Weeds. Russian and English summary.

311-69

PROPOSED PROGRAM FOR ACCELERATED WEED CONTROL IN WYOMING.

E M Holst

Holly Agr News 16(4,WINTER):30-31

1969 66.8 H72

Chemical control (weeds), Herbicides, Weed control.

312-69

SAGEBRUSH REINVASION AS AFFECTED BY SOME ENVIRONMENTAL INFLUENCES.

J R Johnson G F Payne

J Range Manage 21(4):209-213 REF

Jul 1968 60.18 J82

Artemisia, Chemical control (weeds), Environment, Research, Soils, Spraying, Topography.

313-69

STUDIES OF THE INFLUENCE OF SOME PREDOMINANT WEEDS ON THE YIELD PATERN OF SPRING BARLEY. (GE)

G Lincke B Maertin

Albrecht-Thaer-Arch 12(9):847-857

1968 18 AL1

Avena fatua, Barley, Brassica arvensis, Crop yields, Plant physiology, Polygonum convolvulus, Research, Weeds. Russian and English summary.

314-69

INVASION OF GRASSLAND BY BACCHARIS PILULARIS DC.

J McBride H F Heday

J Range Manage 21(2):106-112

Mar 1968 60.18 J82

Baccharis pilularis, Compositae, Integrated control (weeds), Ranges, Shrubs.

Abstract: Remeasurments of early vegetation maps.

315-69

CHEMICAL CONTROL OF PIGWEED. PATENT 3,408,176.

R P Neighbors

Us Patent Office Offic Gaz 855(5):1333

29 Oct 1968 156.65 OF2

Chemical control (weeds), Chemicals, Herbicides, Nitrobenzohydroxamic acid, p-, Patents, Pigweed, Weed control.

316-69

HERBICIDES IN VIETNAM: AAAS BOARD SEEKS FIELD STUDY.

B Nelson

Science 163(3862):58

03 Jan 1969 470 SC12

Chemical control (weeds), Defoliant, Ecology, Herbicides, Research.

317-69

NEW POSSIBILITIES OF WEED CONTROL IN CHICORY (CICHORIUM INTYBUS). (GE)

H Neururer

Pflanzenarzt 20(5):51-52

01 May 1967 464.9 P482

Chemical control (weeds), Chicory, Chloro-N-isopropylacetanilide, 2-, Dacthal, Dosage, Herbicides, CIPC, Semcron, Spraying.

318-69

THE STATE OF WEEDS WHEN APPLYING HERBICIDES AND INSECTICIDES IN CORN FIELDS. (SE)

G Pivar A Skender

Agrohemija (516):227-234

1968 385 AG87

Biochemistry, Chemical control (weeds), Corn, Herbicides, Insecticides, Population, Tables (data), Weeds. English summary.

319-69

THE CHEMICAL CONTROL OF WEEDS IN PINEAPPLE PLANTATIONS. (FR)

C Py

Fruits 23(1):3-12

Jan 1968 80 F9492

Ametryne, Chemical control (weeds), Cyperus rotundus, Diuron, Grasses, Herbicides, Pineapples.

320-69

CONTROL OF DALMATIAN TOADFLAX.

W C Robocker

J Range Manage 27(2):94-98

Mar 1968 60.18 J82

Agropyron, Chemical control (weeds), Foliar application, Herbicides, Linaria dalmatica, Picloram, Silvex, Weeds.

Abstract: Satisfactory control with silvex and no injury to perennial grasses.

321-69

WEED BIOLOGY - A FUTURE.

G R Sagar

Neth J Agr Sci 16(3):155-164 REF

1968 12 N3892

Biology, Plant protection, Weed control, Weeds.

322-69

SAINFOIN - A DRYLAND FORAGE CROP FOR MONTANA.

A F Shaw

Northwest Crop Produc Conf Rep 1967

MEETING:44-47

1967 464.9 N813

Environment, Feed, Forage plants, Sainfoin, Weed control.

323-69

ATRAZINE IN OIL IN SOUTH DAKOTA.

J F Stritzke C E Stymiest R Parker L A

Derscheid

Northwest Crop Produc Conf Rep 1967

MEETING:76-83

1967 464.9 N813

Atrazine, Chemical control (weeds), Field crops, Herbicides, Mineral oil. Atrazine-oil mixture used.

324-69

A COMPARISON OF POST-EMERGENCE HERBICIDES IN YOUNG LUCERNE.

P J Terry J Foster C J Mosha

Arusha Trop Pesticides Res Inst Misc Rep 626, 8 P.

Aug 1967 423.92 G7922

Alfalfa, Chemical control (weeds), D, 2,4-, Dichlorophenoxy) butyric acid, 4-(2,4-, Dinitrobutylphenol, Herbicides, Methyl-4-chlorophenoxy)butyric acid, 4-(2-, 2,4-DB was used alone and mixed with 2,4-D.

325-69

TREE LINE WEED CONTROL IN GOULBURN VALLEY ORCHARDS.

L A G Van Heek

Victorian Hort Dig 11(2,MAY-JUL):9-11

1967 80 V662

Amitrole, Chemical control (weeds), Dalapon, Diquat, Economics, Herbicides, Orchards, Paraquat, Simazine, Trees.

326-69

WE SQUASHED THE WEEDS.

M Wilbur

Org Gard Farming 15(7):76-77

Jul 1968 57.8 OR32

Biological control (weeds), Cantaloupes, Harvesting, Pumpkins, Seed treatment, Tropical plants, Weeds. This article is about the authors personal experience.

327-69

A GUIDE TO CHEMICAL WEED CONTROL IN TROPICAL AND SUBTROPICAL FRUIT AND NUT CROPS IN HAWAII.

W Y J Yee R R Romanowski E T Fukunaga

Hawaii Univ Agr Ext Serv Circ 423:10P

Aug 1968 275.29 H312AC

Chemical control (weeds), Fruit, Herbicides, Nuts, Research, Spraying, Weeds.

OTHER PESTS

328-69

SLUGS CAUSE DAMAGE IN OHIO CORN-FIELDS.

B D Barry

Ohio Rep Res Develop Biol Agr Home Econ

53(4,JUL-AUG):51-53

1968 100 OH3S (3)

Chemical control (pests), Corn, Crop losses, Plant injuries, Plowing, Slugs, Weather.

329-69

RAT POISON AND INSECTICIDE.

S G Lojo

Sugarcane Farmers Bull 2(1):15

Aug 1965 65.8 SU334

Accident prevention, Baits, Dosage, Insecticides, Poisoning, Rats, Rodent control, Rodenticides, Sodium fluoroacetate.

330-69

LIVESTOCK PROTECTION

330-69

DISEASE PREVENTION.

J B R Arbuckle

Pig Farming 16(10):53

Oct 1968 46.8 P623

Animal breeding, Fumigation, Infectious diseases, Preventive medicine, Veterinary medicine.

331-69

GERMINATION BIOLOGY AND THE FIGHT AGAINST THE CHICKENMILLET. (GE)

G Brod

Gesunde Pflanzen 19(3):52-56

464 8 G33

Agricultural research, Biology, Chickens, Echinochloa crusgalli, Herbicides, Millet.

332-69

URINARY CONVERSION PRODUCTS OF INJECTED PROGESTERONE-4-14-C IN THE DOMESTIC FOWL.

P H Chen R H Common

Can J Biochem 47(1):39-45 REF

Jan 1969 470 C16E

Biochemistry, Carbon isotopes, Injections, Metabolism, Poultry, Progesterone, Radioactivity, Urine.

333-69

SCRUB TICK PARALYSIS IN FARM ANIMALS.

S G Knott

Queensland Agr J 94(8):470-474

Aug 1968 23 Q33

Aging, Immunity, Insecticides, Ixodes holocyclus, Livestock, Paralysis, Veterinarians.

334-69

PHARMACEUTICAL GUIDE FOR VETERINARIANS AND STUDENTS OF VETERINARY MEDICINE. (GE)

C Meinecke P Pfegel H Richter

229P LEIPZIG, S. HIRZEL

1967 SF915.M4

Pharmacology, Veterinarians, Veterinary medicine.

335-69

FIRST REPORT OF THE REGULAR LIMNOLOGICAL SURVEY OF LAKE BIWA (OCT. 1965 -DEC. 1966) IV. BEOTHOS.

N Suzuki S Mori

Koto Univ Fac Sci Mem Ser Biol (N S)I(1):78-94

Oct 1967 OH301.K9

Limnology, Reports, Surveys, Time.

336-69

FIRST REPORT OF THE REGULAR LIMNOLOGICAL SURVEY OF LAKE BIWA (OCT. 1965 -DEC. 1966) III. ZOOPLANKTON.

K Yamamoto

Koto Univ Fac Sci Mem Ser Biol (N S)I(1):62-77

Oct 1967 OH301.K9

Aquatic animals, Limnology, Plankton, Reports, Surveys, Time.

337-69

HISTAMINE IN THE COW: PRE- AND POST-PARTURITION HISTAMINE CONCENTRATIONS IN PLASMA, MILK, AND TISSUE.

A Zarkower

Amer J Vet Res 28(127):1751-1755 REF

Nov 1967 41.8 AM3A

Animal physiology, Blood plasma, Cattle, Histamine, Mammary glands, Milk, Parturition, Tissues.

DISEASES

338-69

INTERSTATE TRANSPORTATION OF ANIMALS AND POULTRY. SCABIES IN SHEEP. INTERSTATE MOVEMENT.

R J Anderson

Fed Regist 34(16):1113

24 Jan 1969 L1.451

Animals, Interstate commerce, Legislation, Livestock diseases, Poultry, Scabies, Sheep.

339-69

ANTI-RABIES VACCINATIONS AT THE TOULOUSE UNIVERSITY HOSPITAL CENTER IN 1967. (FR)

G Andrieu

Inst Pasteur Ann 115(2):312-313

Aug 1968 448.3 AN75

Animal vectors, Drug therapy, Human diseases, Immunization, Paralysis, Preventive medicine, Rabies, Vaccines.

340-69

EXPERIMENTAL INFECTION OF CALVES WITH MYXOVIRUS PARAINFLUENZA-3 AND PASTEURELLA HAEMOLYTICA.

D E Baldwin R G Marshall G E Wessman

Amer J Vet Res 28(127):1773-1782 REF

Nov 1967 41.8 AM3A

Antibodies, Calves, Livestock diseases, Parainfluenza-3, Pasteurella haemolytica, Respiratory diseases.

341-69

DURATION OF IMMUNITY DUE TO THE USE OF ANTI HOOF AND MOUTH DISEASE VACCINE PREPARED WITH 10 AND 25 MILLIGRAMS OF SAPONINE PER DOSE. (FR)

O Bayramoglu N Unluleblelici H C Girard

Acad Vet France Bull 41(4):165-168

Apr 1968 41.9 R24

Dosage, Foot-and-mouth disease, Immunity, Livestock diseases, Saponins, Vaccines.

342-69

THE EFFECTIVENESS OF MIXED FEED ENRICHED WITH LYSINE AND METHIONINE WHEN APPLIED FOR CALF BREEDING. (RUS)

J Berzins S Zakharchenko I Zakharchenko

Latv P Sr Zinat Akad Vestis 4(249):87-92 REF

1968 511 R442

Animal nutrition, Breeding, Cattle, Feed, Lysine, Methionine.

343-69

DIAGNOSIS AND PROPHYLAXIS OF INFECTIOUS LARYNGEAL TRACHEITIS OF POULTRY IN THE USSR. (GE)

B F Bessarabov

Monatsh Vet 22(21):869-872 REF

01 Nov 1967 41.8 M742

Animal diseases, Diagnosis, Epidemiology, Infectious diseases, Laryngotracheitis, Poultry, Vaccines. English summary.

344-69

THE PRESENT CLINICAL AND PATHOLOGICAL PICTURE OF CHRONIC ERYSIPELAS INFECTION IN PIGS. III-V. (GE)

W Bisping K H Bohm E Weiland H Wissdorf L C Schulz

Deut Tierarztl Wochensh 75(18):445-456 REF

15 Sep 1968 41.8 D482

Arthritis, Bacterial diseases (animals), Diagnosis, Erysipelothrix insidiosa, Infectious diseases, Listeria monocytogenes, Methylene blue, Serological tests, Swine erysipelas, Symptomatology. English summary.

345-69

TWO SIDES TO THE VACCINE PICTURE.

P G Box

Poultry Indus 32(4):39,41

Jun 1968 47.8 P8644

Antibiotics, Birds, Immunization, Legislation, Livestock diseases, Newcastle disease vaccines, Poultry industry, Vaccines, Viruses.

346-69

CONTROL BY OVARIAN STATUS OF INDUCED LEUKOCYTIC RESPONSES IN THE SHEEP UTERUS.

T H Brinsfield H W Hawk E C Leffel

Amer J Vet Res 28(127):1723-1725

Nov 1967 41.8 AM3A

Animal physiology, Escherichia coli, Leukocytes, Ovaries, Sheep, Uterus.

347-69

EVALUATION OF BRUCELLA ABORTUS STRAIN 45/20 BACTERINS PREPARED WITH VARIOUS ADJUVANTS.

G M Brown

U S Agr Res Serv ARS- (70):1-8 REF

Dec 1968 A41.9 R315AR

Animal physiology, Bacterial diseases (animals), Bacterins, Brucella abortus, Guinea pigs, Immunization, Immunology, Laboratory animals, Tissues, Virulence.

348-69

A PERPLEXING CASE OF HOG CHOLERA CONFIRMED BY VIRUS ISOLATION AND SUPPORTED BY THE FLUORESCENT ANTIBODY SERUM NEUTRALIZATION TEST.

E A Cabrey W C Stewart E R Seaman W V Rumpel

U S Agr Res Serv ARS- (70):9-10

Dec 1968 A41.9 R315AR

Diagnosis, Erysipelothrix insidiosa, Fluorescent antibody technic, Hog cholera, Livestock diseases, Serum neutralization test, Swine, Virus diseases (animals).

349-69

NEURAL LESIONS IN THE OFFSPRING OF FEMALE RATS FED A COPPERDEFICIENT DIET.

W W Carlton W A Kelly

J Nutr 97(1):42-52 REF

Jan 1969 389.8 J82

Animal nutrition, Copper, Deficiency diseases, Diet, Nerves, Rats.

350-69

DRUGS: HOW DO YOU USE THEM .

L H Carroll

Cattlemen 55(6):38,58

Nov 1968 49 C29

Antibiotics, Cattle, Drug therapy, Drugs, Livestock diseases, Preventive medicine, Vaccines.

351-69

HISTOPATHOLOGIC STUDIES OF LUNG CHANGES IN SCRAPIE AND NONSCRAPIE BLOOD LINE SHEEP MAINTAINED IN A SCRAPIE ENVIRONMENT.

D R Cassidy H A McDaniel

U S Agr Res Serv ARS- (70):43-44

Dec 1968 A41.9 R315AR

Animal histology, Blood, Diagnosis, Erysipelothrix insidiosa, Histopathology, Livestock diseases, Lungs, Scrapie, Sheep, Tissues.

352-69

ERYSIPELAS--OUR COSTLIEST PIG DISEASE.

D C Clague

Queensland Agr J 94(8):511-513

Aug 1968 23 Q33

Autopsies, Diagnosis, Erysipelas bacterins, Erysipelothrix insidiosa, Livestock diseases, Swine, Vaccines.

353-69

INHIBITION OF ELECTRON TRANSPORT ENZYMES AND CHOLINESTERASES BY ENDRIN. (ABSTRACT).

H J Colvin A T Phillips

Excerpta Med Pharm Toxicol 21(11):550

Nov 1968 241.64 EX23

Animal physiology, Cholinesterases, Electrons, Endrin, Enzymes, Icterus melas, Pesticides. From Bulletin of Environmental Contamination and Toxicology. 1968, 3/2, (146-115).

354-69

STUDIES ON ACUTE MAREK'S DISEASE. VI. BODY TEMPERATURE OF INFECTED CHICKENS.

W M Colwell S C Schmitt

Avian Dis 7(4):716-723

Nov 1968 41.8 AV5

Avian lymphomatosis, Chickens, Livestock diseases, Research, Temperature.

- 355-69
CONSIDERATIONS ABOUT SOME DISEASES OF FOWL TRANSMITTABLE TO MAN: ASPERGILLOSIS, MONILIASIS, STAPHYLOCOCCOSIS. (FR)
A Devos
Rev Med Vet (toulouse) 119(11):1023-1029 REF
Nov 1968 41.8 R32
Aspergillosis, Human diseases, Infectious diseases, Moniliasis, Poultry diseases, Staphylococcus. English, German and Spanish summaries.
- 356-69
FELINE PANLEUCOPENIA- A SEROLOGICAL STUDY.
L B Fastier
Vet Rec 83(25):653-655
21 Dec 1968 41.8 V641
Animal diseases, Antibodies, Cats, Dosage, Feline infectious enteritis, Immunization, Serological tests, Vaccines, Virus diseases (animals).
- 357-69
PRELIMINARY STUDY OF AN ENTEROVIRUS ISOLATED FROM A BALANOPOSTHITE LESION OF CATTLE. (FR)
P Faye A Charton A Berkloff C Bernard Cl Le Layec
Acad Vet France Bull 41(4):155-159
Apr 1968 41.9 R24
Artificial insemination, Balanoposthitis, Livestock diseases, Reproductive organs, Serological tests.
- 358-69
APPLICATION OF STRESSES TO FOOT-AND-MOUTH DISEASE VIRUS.
O N Fellows
Amer J Vet Res 28(12):1873-1880 REF
Nov 1967 41.8 AM3A
Biological assay, Foot-and-mouth disease virus, Research, Tissue culture.
- 359-69
ENDOTOXIN PROPERTIES OF LEPTOSPIRA CANICOLA.
D R Finco D G Low
Amer J Vet Res 28(12):1863-1872 REF
Nov 1967 41.8 AM3A
Animal diseases, Chickens, Culture media, Embryos, Endotoxins, Escherichia coli, Leptospira canicola, Rabbits.
- 360-69
AIRSACCULITIS RELATION TO MYCOPLASMAS IN TURKEYS FREE OF MYCOPLASMA GALLISEPTICUM.
M L Frey D P Anderson R P Hanson
Avian Dis 7(4):693-699
Nov 1968 41.8 AV5
Air sacculitis, Livestock diseases, Mycoplasma, Mycoplasma gallisepticum, Turkeyes.
- 361-69
SOME EFFECTS OF ROUTE OF ADMINISTRATION AND DILUTION ON THE TOXICITY OF CARBON TETRACHLORIDE DRENCHES FOR SHEEP.
C D Gee
Inst Vet Insp New S Wales Vet Insp Annu 31:80-83
1967 41.9 IN73
Biochemistry, Carbon tetrachloride, Drug therapy, Livestock diseases, Sheep.
- 362-69
ACUTE AND CHRONIC ERYSIPELOTHRIX RHUSIOPATHIAE INFECTION IN RATS: HISTOPATHOLOGICAL EXAMINATION.
H D Geissinger
Zentralbl Vet (SER B) 15(4):471-485
Jun 1968 41.8 Z52
Animal diseases, Animal histology, Arteritis, Diagnosis, Erysipelothrix insidiosus, Rats. German, French, Spanish summaries.
- 363-69
A SEROLOGICAL INQUIRY ABOUT BRUCELLOSIS IN TOULOUSE VETERINARY STUDENTS. (FR)
M F Giral J Lasserre P Saurat R Lautic J Chantal
Rev Med Vet (toulouse) 119(11):1005-1022 REF
Nov 1968 41.8 R32
Antibodies, Brucellosis, Human diseases, Kinetics, Serological tests. English, German and Spanish summaries.
- 364-69
RESEARCH NOTE: OBSERVATIONS ON IMMUNE FACTORS ASSOCIATED WITH ARIZONA GROUP INFECTIONS IN TURKEYS.
H Gerlach H E Adler A S Rosenwald
Avian Dis 7(4):681-686
Nov 1968 41.8 AV5
Bacteria, Eggs, Immunity, Livestock diseases, Paracolobactrum arizonae, Research, Turkeyes.
- 365-69
MEDICAL OBSERVATIONS CONCERNING ORNITHOSIS CONTROL IN THE POULTRY INDUSTRY. (GE)
H Grahneis
102P REF BERLIN, VOLK UND GESUNDHEIT
1967 SF995.G7
Human diseases, Occupational diseases, Ornithosis, Poultry diseases, Poultry industry, Serological tests, Symptomatology, Veterinary medicine, Virus diseases (animals).
- 366-69
A FOCAL POINT OF PSEUDORABIES OF DOGS IN THE DEPARTMENT OF AIN. (FR)
J-C Guillon C Chirol A Vallee J-C Cordailat J-C Beylot
Acad Vet France Bull 41(4):177-179
Apr 1968 41.9 R24
Dogs, Pseudorabies, Symptomatology, Virus diseases (animals).
- 367-69
A SELECTIVE-DIFFERENTIAL MEDIUM FOR DETECTION OF STREPTOCOCCUS AGALACTIAE.
R K Guthrie K W Brunson J C Stiles
Rak J Comp Med Vet Sci 32(1):366-367
Jan 1968 41.8 C162
Animal diseases, Culture media, Dairy cattle, Milk, Streptococcus agalactiae.
- 368-69
THE ERADICATION OF BOVINE TUBERCULOSIS AND BRUCELLOSIS.
R A Hall
Inst Vet Insp New S Wales Vet Insp Annu 31:21-26
1967 41.9 IN73
Brucellosis, Cattle, Livestock diseases, Tuberculosis.
- 369-69
SWINE MASTITIS-METRITIS AGALACTIA SYNDROME.
R E Hall F J Giesler
Hog Prod 4(7):4
Jul 1968 46.8 H675
Agalactia, Animal diseases, Antibiotics, Chemical control (animal diseases), Escherichia coli, Hormones, Mastitis, Metritis, Starvation, Swine, Symptomatology.
- 370-69
EFFECT OF DIETARY FAT SOURCE ON THE APPARENT DIGESTIBILITY OF FAT AND THE COMPOSITION OF FECAL LIPIDS OF THE YOUNG PIG.
R M G Hamilton B E McDonald
J Nutr 97(1):33-41 REF
Jan 1969 389.8 J82
Animal nutrition, Diet, Digestion, Fats, Feces, Lipids, Swine.
- 371-69
ORYZOXMYCIN, A NEW ANTIBIOTIC.
T Hashimoto S Kondo
J Antibiot 21(11):653-658
Nov 1968 396.8 J824
Antibiotics, Oryzoxymycin, Streptomyces, Xanthomonas oryzae. Oryzoxymycin, from Streptomyces, inhibited Xanthomonas.
- 372-69
EQUINE OVARIAN GRANULOSA TUMOURS.
G J R Hovell S L Hignett
Vet Rec 82(21):607
25 May 1968 41.8 V641
Animal abnormalities, Chorionic gonadotropins, Granulosa cell tumor, Horses, Neoplasms, Ovarian cysts, Teratoma.
- 373-69
BRUCELLA OVIS INFECTION.
K L Hughes
Inst Vet Insp New S Wales Vet Insp Annu 31:64-67 REF
1967 41.9 IN73
Brucella ovis, Livestock diseases, Sheep.
- 374-69
CHOLERA ERADICATION PROGRESS REPORT.
Iowa Vet 39(6,NOV-DEC):5-8 REF
1968 41.8 IO9
Agricultural regulation, Hog cholera, Immunization, Livestock diseases, Reports, Swine, Vaccines.
- 375-69
ATTENUATION OF HOG CHOLERA VIRUS IN THE CARRIER CELL STRAINS ESTABLISHED FROM KIDNEYS OF PIGS EXPERIMENTALLY INFECTED WITH THE VIRULENT VIRUS.
H Izawa M Soekawa
Amer J Vet Res 28(127):1661-1669
Nov 1967 41.8 AM3A
Animal diseases, Disease transmission, Hog cholera virus, Kidneys, Swine, Tissue culture, Viruses.
- 376-69
STUDIES ON THE EPIDEMIOLOGY OF VESICULAR STOMATITIS VIRUS.
E W Jenney C L Brown
U S Agr Res Serv ARS- (70):35-40 REF
Dec 1968 A41.9 R315AR
Arthropoda, Diagnosis, Epidemiology, Insect vectors, Livestock diseases, Serological tests, Vesicular stomatitis virus, Virus diseases (animals).
- 377-69
THE PRACTICE OF THE PRESENT DIAGNOSTIC OF RABIES. (FR)
L Joubert M Lombard
Rev Med Vet (toulouse) 119(11):1041-1056
Nov 1968 41.8 R32
Autopsies, Diagnosis, Fluorescence, Immunofluorescence, Rabies, Virus diseases (animals). English, German and Spanish summaries.
- 378-69
CONCENTRATION OF CERTAIN MYXOVIRUSES WITH POLYETHYLENE GLYCOL.
A D Kanarek G W Tribe
Nature 214(5091):927-928
27 May 1967 472 N21
Assay, Chromatography, Hemagglutination, Microbiology, Myxoviruses, Polyethylene glycol, Tables (data), Virus diseases (animals).
- 379-69
NOTICE OF FILING OF PETITION FOR FOOD ADDITIVES DECOQUINATE AND PROCAINE PENICILLIN.
J K Kirk
Fed Regist 34(14):946
22 Jan 1969 L1.451
Chemical control (animal diseases), Chickens, Coccidiosis, Decoquinat, Feed, Food additives, Legislation, Penicillin, Procaine.
- 380-69
TRICHINOSIS AND SARCOSPORIDIOSIS IN A PUMA.
J P Kluge
Wildlife Dis Ass Bull 3(3):110-111
Jul 1967 41.9 W64B

381-69

Cytoplasm, Dict, Felis concolor, Histology, Reports, Research, Sarcosporidiosis, Trichinella spiralis.

381-69

IF VACCINES GO - WILL HOG CHOLERA FOLLOW.

C R Koch

Farm Quart 23(6,WINTER):78-79,97-98, 100

1969 6 F22995

Hog cholera, Hog cholera vaccines, Swine, Virus diseases (animals).

382-69

CARD BRUCELLOSIS TEST... SWINE.

V D Ladwig

Iowa Vet 39(6,NOV-DEC):9-11,14

1968 41.8 IO9

Agricultural regulation, Brucellosis, Diagnosis, Livestock diseases, Swine.

383-69

ANTI-RABIES VACCINATIONS AT THE MONTEPELLIER CENTER IN 1967. (FR)

G Lanotte

Inst Pasteur Ann 115(2):310-311

Aug 1968 448.3 AN75

Animal vectors, Drug therapy, Human diseases, Immunization, Paralysis, Preventive medicine, Rabies, Vaccines.

384-69

ANTI-RABIES VACCINATIONS AT THE PASTEUR INSTITUTE OF LYON IN 1967. (FR)

F Lebeuf

Inst Pasteur Ann 115(2):305-307

Aug 1968 448.3 AN75

Animal vectors, Drug therapy, Human diseases, Immunization, Paralysis, Preventive medicine, Rabies, Vaccines.

385-69

SUSCEPTIBILITY OF EMBRYONIC SWINE SPLEEN AND SWINE KIDNEY CELL LINES TO HOG CHOLERA VIRUS.

L R Lee E A Carbrey W C Stewart J I Dresse

US Agr Res Serv ARS- (70):22-23

Dec 1968 A41.9 R315AR

Cells, Embryos, Hog cholera virus, Kidneys, Livestock diseases, Spleen, Susceptibility, Swine, Virus diseases (animals).

386-69

ISOLATION AND CHARACTERIZATION OF A PORCINE ENTEROVIRUS.

L R Lee W C Stewart J I Kresse E A Carbrey

US Agr Res Serv ARS- (70):13-18

Dec 1968 A41.9 R315AR

Diagnosis, Enteroviruses, Hog cholera, Livestock diseases, Swine, Tissue culture, Virus diseases (animals).

387-69

ANTI-RABIES VACCINATIONS AT THE PASTEUR INSTITUTE IN 1967. (FR)

P Lepine P Atanasiu A Famet J F Vieu Ch Vialat

Inst Pasteur Ann 115(2):297-304

Aug 1968 448.3 AN75

Animal vectors, Drug therapy, Human diseases, Immunization, Preventive medicine, Rabies, Vaccines.

388-69

TUBERCULOSIS IN THE PIG AND THE TUBERCULIN TEST.

I W Lesslie K J Birn P Stuart P A F O'Neill J Smith

Vet Rec 83(25):647-651 REF

21 Dec 1968 41.8 V641

Dosage, Livestock diseases, Mycobacterium avium, Mycobacterium bovis, Mycobacterium tuberculosis, Swine, Tuberculin, Tuberculin test, Tuberculosis.

389-69

THE OCCURRENCE OF STREPTOCOCCI OF VARIOUS SEROLOGICAL GROUPS AS THE

CAUSE OF MASTITIS WITH SPECIAL CONSIDERATION OF GROUP L. (GE)

P Lorenzen

Arch Lebensmittelhgy 19(3):57-60

Mar 1968 41.8 L49

Food sanitation, Human nutrition, Livestock diseases, Mastitis, Milk analysis, Serological tests, Streptococcus, Streptococcus agalactiae.

390-69

EPIZOOTIOLOGY OF BLUETONGUE. ABSTRACT.

A J Luedke

Wildlife Dis Ass Bull 3(3):119

Jul 1967 41.9 W64B

Bluetongue virus, Epizootic diseases, Immunology, Infectious diseases, Research, Ruminants. Abstract from Wildlife Disease Conference in Illinois

391-69

CHARACTERISATION AND FRACTIONISATION OF VARIOUS STRAINS OF TESCHEN VIRUS BY COLUMN CHROMATOGRAPHY AND ELECTROPHORESIS. (GE)

W Matthaeus

Zentralbl Vet (SER B) 15(4):443-452 REF

Jun 1968 41.8 Z52

Autoradiography, Chromatography, Electrophoresis, Swine, Teschen disease virus, Tissue culture, Virus diseases (animals). English, French, Spanish summaries. the strains of Teschen virus were Konratice and Tyrol.

392-69

A FILTERABLE, PROLIFERATING FACTOR SIMULATING AUTOIMMUNITY IN MALARIOUS AND NONMALARIOUS DUCKLINGS.

R B McGhee W E Loftis

Exp Parasitol 22(3):299-308 REF

Jun 1968 436.8 EX7

Anemia, Ducklings, Immunity, Malaria, Plasmodium lophurae.

393-69

EVALUATION OF THE FLUORESCENT ANTIBODY-CELL CULTURE TESTS FOR HOG CHOLERA DIAGNOSIS.

W L Mengeling J P Torrey

Amer J Vet Res 28(127):1653-1659 REF

Nov 1967 41.8 AM3A

Animal diseases, Blood tests, Fluorescent antibody technique, Hog cholera, Hog cholera virus, Spleen, Swine, Tissue culture.

394-69

HEREDITY AND DISEASE IN DOMESTIC ANIMALS. (GE)

H Meyer

158P REF HANNOVER, M. AND HI SCHIAPER

1968 SF758.M4

Animal diseases, Animal genetics, Genes, Hereditary diseases, Immunity, Livestock.

395-69

AN OUTBREAK OF DUCK VIRUS ENTERITIS (DUCK PLAGUE) IN THE UNITED STATES.

R L Muhm

US Agr Res Serv ARS- (70):29-32

Dec 1968 A41.9 R315AR

Ducks, Enteritis, Epidemiology, Virus diseases (animals).

396-69

EXPERIMENTAL DATA ON THE PATHOGENESIS OF EDEMA DISEASE OF SWINE. CLINICAL PICTURE, GROSS AND MICROSCOPIC LESIONS RELATED TO ENDOTOXIN SHOCK.

Z Nagy I Berezi L Bertok

Zentralbl Vet (SER B) 15(4):504-511 REF

Jun 1968 41.8 Z52

Diagnosis, Edema disease, Endotoxins, Escherichia coli, Lipopolysaccharides, Livestock diseases, Research, Shock, Swine. German, French, Spanish summaries.

397-69

NUTRIENT REQUIREMENTS OF POULTRY.

Nat Res Counc Comm Anim Nutr Nutr Requ

Dom Anim (1):28P REF

1966 389.7 N2122

Animal nutrition, Chickens, Deficiency diseases, Feed, Minerals, Poultry, Symptomatology, Turkeys, Vitamins.

398-69

NUTRIENT REQUIREMENTS OF DAIRY CATTLE.

Nat Res Counc Comm Anim Nutr Nutr Requ

Dom Anim (3):38P REF

1966 389.7 N2122

Animal nutrition, Antibiotics, Dairy cattle, Deficiency diseases, Energy, Feed, Minerals, Proteins, Urea, Vitamins, Water.

399-69

NUTRIENT REQUIREMENTS OF HORSES.

Nat Res Counc Comm Anim Nutr Nutr Requ

Dom Anim (6):1-22 REF

1966 389.7 N2122

Animal nutrition, Animal physiology, Feeds, Horses, Minerals, Proteins, Vitamins.

400-69

REPORT OF THE COMMITTEE ON NOMENCLATURE AND REPORTING OF DISEASE, NORTHWESTERN CONFERENCE ON AVIAN DISEASES, JUNE 1968.

Avian Dis 7(4):730-736

Nov 1968 41.8 AV5

Livestock diseases, Nomenclature, Poultry, Reports.

401-69

STUDIES ON PREVENTION OF MINK-DISTEMPER. (JA)

S Ohkuma Y Fukuda T Shimamura T Saito

Tokyo Soc Vet Zootech Sci J (14/15):54-57

Dec 1965 41.9 T574

Animal diseases, Canine distemper, Minks.

402-69

BREAST BLISTERS IN TURKEYS.

R T Parry

Poultry Rev 8(2):23-29 REF

Sep 1968 47.8 P8699

Agricultural industries, Bacteria, Bacterial diseases (birds), Economics, Keel cysts, Microorganisms, Poultry diseases, Turkeys.

403-69

MODIFICATIONS OF THE NATURAL RESISTANCE TO INFECTION OF MICE TREATED BY SEVERAL HISTONE FRACTIONS. (FR)

M Pelletier A Delaunay

Inst Pasteur Ann 115(2):249-263 REF

Aug 1968 448.3 AN75

Dosage, Histones, Injections, Mice, Salmonella typhimurium. English summary.

404-69

THE INACTIVATION EFFECT OF BETA-PROIOLACTONE ON THE VIRUS OR THE CLASSICAL FOWL PLAGUE. (CZ)

R Polony J Vrtiak

Czech Min Zemed Les Hospod Ustav Vedeckotech

Inform Vet Med 13(1):31-36 REF

Jan 1968 41.9 C333

Chemical control (animal diseases), Drug therapy, Fowl plague virus, Hydracrylic acid beta-lactone, Temperature, Vaccines, Virus diseases (animals). English, German, and Russian summaries.

405-69

TONSILLAR CARCINOMA IN RURAL DOGS.

W L Ragland Gorham

Nature 214(5091):925-926

27 May 1967 472 N21

Air pollution, Animal diseases, Carcinoma, Dogs, Neoplasms, Rural population, Tonsils.

406-69

BOVINE OSTERTAGIOSIS. ANALYTICAL BIBLIOGRAPHIC REVIEW OF THE DISEASE, ITS TREATMENT AND ITS PROPHYLAXIS. (FR)

- J P Raynaud
Rec Med Vet 144(8):743-769 REF
Aug 1968 41.8 R24
Animal diseases, Bibliography, Cattle, Diagnosis, Disease control, Drugs, Ecology, Etiology, Fascioliasis, Nematodes, Ostertagia ostertagi, Ostertagiasis, Pastures, Symptomatology. English and Spanish summaries.
- 407-69
CONTRIBUTION TO THE STUDY OF THE PROTECTION OF DOMESTIC RABBIT AGAINST TOTAL IRRADIATION BY GAMMA RADIATION. (FR)
A G Rico G Lorgue
Rev Med Vet (toulouse) 119(11):1031-1040
Nov 1968 41.8 R32
Deoxyribonucleic acid, Gamma rays, Irradiation, Rabbits, Research, X-rays. English, German and Spanish summaries.
- 408-69
THE USE OF BRUCELLA WHEY COMPLEMENT FIXATION TEST IN A HERD OUTBREAK.
L Robertson I D Farrell
Vet Rec 83(25):643-646
21 Dec 1968 41.8 V641
Agglutination test, Antibodies, Brucella abortus, Cattle, Complement fixation, Livestock diseases, Milk analysis, Udders, Vaccines.
- 409-69
PREVENTION, DIAGNOSIS AND TREATMENT OF DISEASE.
J D Russell F L Adams
Amer Fur Breeder 14(3):143-171
Dec 1968 41.0 AM33
Animal diseases, Diagnosis, Disease control, Drug therapy, Minks. Many specific diseases were listed including the symptoms, causes, and treatments.
- 410-69
PATHOGENESIS OF THE ROUND HEART SYNDROME IN TURKEYS.
J H Sautter J A Newman S H Kleven C T Larsen
Avian Dis 7(4):614-628 REF
Nov 1968 41.8 AV5
Heart, Livestock diseases, Round heart disease, Turkeys.
- 411-69
CHARACTERIZATION OF AGGLUTININS OF CATTLE SERUM AGAINST BRUCELLA ABORTUS.
D Schimmel W Erler
Amer J Vet Res 28(12):1919-1920
Nov 1967 41.8 AM3A
Blood serum, Brucella abortus, Cattle, Serological tests.
- 412-69
STUDIES ON ACUTE MAREK'S DISEASE. IV. RELATIVE SUSCEPTIBILITY OF DIFFERENT LINES AND CROSSES OF CHICKENS TO GA ISOLATE.
S C Schmitt C S Eidson
Avian Dis 7(4):571-576 REF
Nov 1968 41.8 AV5
Avian lymphomatosis, Breeding, Chickens, Immunity, Livestock diseases, Research.
- 413-69
AN OUTBREAK OF RABIES IN SWINE.
K C Sherman D C Gigstad H A McDaniel
US Agr Res Serv ARS- (70):53-54
Dec 1968 A41.9 R315AR
Animal histology, Diagnosis, Encephalitis, Epidemiology, Fluorescent antibody technic, Livestock diseases, Rabies, Swine.
- 414-69
A NEW TYPE IN EXPERIMENTAL INTRAPERITONEAL INFECTION OF STAPHYLOCOCCI IN MICE.
T. Shimizu Y Ito S Shibata
Tokyo Nat Inst Anim Health Quart 8(1):8-15 SPRING, REF
1968 41.9 T575Q
Animal diseases, Coagulase, Immunization, Mice, Peritoneum, Staphylococcus.
- 415-69
TICK FEVER IN POULTRY.
I P Singh
Com Hort Floristry 4(3):23-24
Jan 1968 S19.P7
Blood parasites, Borrelia anserina, DDT, Insect control, Ikodides, Malathion, Microscopy, Penicillin, Piroplasmosis, Poultry, Poultry diseases, Symptomatology, Vaccines.
- 416-69
MASTITIS PREVENTION AND CONTROL.
R P Singh
Gosamvardhana 16(5):31
Aug 1968 43.8 G69
Bacteria, Cattle, Chemical control (animal diseases), Fungi, Livestock diseases, Mammary glands, Mastitis, Milk analysis, Yeasts.
- 417-69
ANTI-RABIES VACCINATIONS AT THE MARVILLE PASTEUR CENTER IN 1967. (FR)
J Sivan
Inst Pasteur Ann 115(2):308-309
Aug 1968 448.3 AN75
Animal vectors, Drug therapy, Human diseases, Immunization, Paralysis, Preventive medicine, Rabies, Vaccines.
- 418-69
COMPARATIVE STUDY OF THE PATHOGENIC AND IMMUNOGENIC POWER OF A NEW ACAPSULOGENIC STRAIN OF BACILLUS ANTHRACIS (IHTIMAN STRAIN). (FR)
R S Slavtchev
Inst Pasteur Tunis Arch 44(4):383-390
Dec 1967 448.3 IN72
Animal diseases, Bacillus anthracis, Immunology, Laboratory animals.
- 419-69
ISOLATION OF RABIES VIRUS FROM FRUIT BATS IN THAILAND.
P C Smith K Lawhasnadi W E Vick J S Stanton
Nature 216(5113):384
28 Oct 1968 472 N21
Animal vectors, Bats, Brain, Fluorescent antibody technic, Injections, Mice, Rabies virus, Research, Salivary glands, Virus diseases (animals).
- 420-69
BLOOD CHEMICAL AND CELLULAR CHANGES IN CANINE DIROFILARIASIS.
J W Snyder S K Liu R J Tashjian
Amer J Vet Res 28(127):1705-1710
Nov 1967 41.8 AM3A
Alpha globulins, Blood chemistry, Blood composition, Dirofilaria, Dogs, Gamma globulins, Serum albumin.
- 421-69
DISEASE REPORTS OF THE SOUTHERN CONFERENCE ON AVIAN DISEASES (SCAD) 1967.
Avian Dis 7(4):737-754
Nov 1968 41.8 AV5
Livestock diseases, Poultry, Reports.
- 422-69
DIFFERENTIATION OF MYCOBACTERIA ISOLATED FROM DOMESTIC ANIMALS. (GE)
H Stenberg A Turunen
Zentralbl Vet (SER B) 15(4):494-503 REF
Jun 1968 41.8 Z52
Diagnosis, Livestock diseases, Mycobacterium, Tuberculosis. English, French, Spanish summaries.
- 423-69
STUDIES ON THE CHROMATIN ISOLATED FROM THE ORGANS OF ANIMALS RECEIVED WHOLE-BODY X-RAY IRRADIATION.
H Su Nam
Seoul Univ J Biol Agr Ser (b) (SER B) 18:118-127 REF
Sep 1967 442.9 SO84
Animals, Biochemistry, Chromatin, Deoxyribonucleic acid, Proteins, Viscera, X-rays. Chinese summary.
- 424-69
EFFECT OF DIFFERENT PATTERNS OF EXCESS AMINO ACIDS ON PERFORMANCE OF CHICKS FED AMINO ACID-DEFICIENT DIETS.
M Sugahara D H Baker H M Scott
J Nutr 97(1):29-32
Jan 1969 389.8 J82
Amino acids, Animal nutrition, Chickens, Deficiency diseases, Diet.
- 425-69
THE EFFECTS OF VARIOUS DRUGS ON EXPERIMENTAL CHICKEN COCCIDIOSIS. (JA)
M Taniguchi K Nomata
Tokyo Soc Vet Zootech Sci J (14/15):58-68 REF
Dec 1965 41.9 T574
Chickens, Coccidiosis, Drug therapy, Poultry diseases.
- 426-69
EFFECTIVENESS OF ANTIBACTERIALS INFUSED INTO THE PROXIMAL COLON ON THE PIG.
H S Teague A P Grifo R L Harrold D R Redman
J Anim Sci 28(1):13-17
Jan 1969 49 J82
Antibiotics, Bacteria, Colon, Dosage, Drug therapy, Research, Swine.
- 427-69
INFLUENCE OF MICROORGANISMS ON INTESTINAL ABSORPTION: OLEIC ACID 131I AND TRIOLEIN 131I ABSORPTION BY GERM-FREE AND CONVENTIONALIZED RATS.
B Tennant M Reina-Guerra D Harrold M Goldman
J Nutr 97(1):65-69 REF
Jan 1969 389.8 J82
Absorption, Animal physiology, Germ-free life, Intestines, Microorganisms, Oleic acid, Rats, Triolein.
- 428-69
EXPERIMENTAL BLUETONGUE DISEASE IN WHITE-TAILED DEER. ABSTRACT.
D O Trainer R A Vosdigh B C Easterday
Wildlife Dis Ass Bull 3(3):120
Jul 1967 41.9 W64B
Bluetongue virus, Deer, Infectious diseases, Mortality, Research. Abstract from Wildlife Disease Conference in Illinois
- 429-69
INDIRECT COMPLEMENT FIXATION IN FOOT-AND-MOUTH DISEASE. I. STUDY OF ANTIBODY RESPONSE IN EXPERIMENTAL CATTLE AND SHEEP. II. SCREENING OF CATTLE SERUM.
E Traub M Hessami A Shafiyi
Zentralbl Vet (SER B) 15(4):421-442 REF
Jun 1968 41.8 Z52
Antibodies, Cattle, Complement fixation, Foot-and-mouth disease, Immunization, Livestock diseases, Serum, Sheep, Tissue culture, Virus diseases (animals). German, French, Spanish summaries.
- 430-69
THE HISTORY OF INVESTIGATION OF TUMORS IN ANIMALS. (GE)
H Trebbin
Deut Tierarztl Wochensh 75(18):463-464 REF
15 Sep 1968 41.8 D482
Animal diseases, Cancer, History, Human diseases, Neoplasms. English summary.
- 431-69
EXPERIMENTAL BLUETONGUE DISEASE IN WHITE-TAILED DEER.
R A Vosdigh D O Trainer B C Easterday
Can J Comp Med Vet Sci 32(1):382-387 REF
Jan 1968 41.8 C162
Bluetongue, Deer, Research, Virus diseases (animals).

LIVESTOCK PROTECTION

432-69

432-69
PINKEYE IN CATTLE.
C E J Walker
Inst Vet Insp New S Wales Vet Insp Annu 31:28-29
1967 41 9 IN73
Cattle, Eyes, Infectious keratitis, Livestock diseases.

433-69
PENETRATION PATTERNS OF MYCOPLASMA GALLISEPTICUM AND NEWCASTLE DISEASE VIRUS THROUGH THE OUTER STRUCTURES OF CHICKEN EGGS.
J E Williams L H Dillard
Avian Dis 7(4):650-657 REF
Nov 1968 41.8 AV5
Chickens, Eggs, Mycoplasma gallisepticum, Newcastle disease virus, Virus diseases (animals).

434-69
CYTOCHROME C AND EVOLUTION.
T Yamanaka
Nature 213(5082):1183-1186 REF
25 Mar 1967 472 N21
Bacillus subtilis, Biochemistry, Cattle, Cytochrome oxidase, Pseudomonas aeruginosa.

ARTHROPODS

435-69
GET RID OF GRUBS IN A HURRY.
B Fichte
Cattleman 55(6):112-114
Nov 1968 49 C29
Blood tests, Chemical control (insects), Grubs, Hides, Insect pests, Insecticides, Livestock, Pest control.

436-69
TRYPANOSOMA GLABRA N. SP., PARASITE OF MEXICAN FROGS. MORPHOLOGY AND CYCLE IN THE VERTEBRATE. (SP)
R Perez-Reyes
Rev Latinoamer Microbiol Parasitol 10(2, APR-JUN):79-84
1968 448.8 R32
Culex pipiens quinquefasciatus, Frogs, Insect vectors, Trypanosoma glabra. English summary.

437-69
LANJAN VIRUS, A NEW AGENT ISOLATED FROM DERMACENTOR AURATUS IN MALAYA.
C E G Smith D A McMahon E T W Bowen
Nature 214(5093):1154-1155
10 Jun 1967 472 N21
Antigens, Chromatography, Dermacentor, Injections, Insect vectors, Lanjan virus, Parasitic insects, Virus diseases (animals), Zoogeography.

438-69
TICK-BORNE DISEASES OF CATTLE IN TRINIDAD.
H E Williams
Agr Soc Trinidad Tobago J 68(2):149-151,153-155,157-158
Jun 1968 8 T73
Anaplasmosis, Cattle, Fever, Insect vectors, Ixodidae, Livestock diseases, Piroplasmiasis, Symptomatology.

PARASITES

439-69
STRAIN VARIATION IN THE RESPONSE OF HAEMONCHUS CONTORTUS IN SHEEP AND GOATS GIVEN PHENOTHIAZINE: EFFICACY OF N.F. AND PURIFIED PRODUCTS ON PURE PARASITIC INFECTIONS.
M L Colglazier F D Enzie R P Lehmann
Amer J Vet Res 28(127):1711-1722 REF
Nov 1967 41.8 AM3A

BIBLIOGRAPHY

Goats, Haemonchus contortus, Parasitism, Phenothiazine, Sheep.

440-69
HYOSTRONGYLUS RUBIDUS: A FIELD STUDY OF ITS PATHOGENESIS, DIAGNOSIS AND TREATMENT.
J B Davidson M J Murray I H Sutherland
Vet Rec 83(23):582-587
07 Dec 1968 41.8 V641
Diagnosis, Drug therapy, Helminthiasis, Hyostrogylus rubidus, Livestock diseases, Oesophagostomum, Parasitism, Swine, Thiazolyl-benzimidazole, 2-(4-.

441-69
DIAGNOSTIC STATION NEAR DUNEDIN IS NEW ZEALAND'S WATCHDOG AGAINST DISEASE.
B G Joyce
New Zeal J Agr 117(4):100-101,103
Oct 1968 23 N48J
Animal diseases, Cestoda, Diagnosis, Dogs, Echinococcosis, Economics, Formaldehyde, Parasitic nematodes.

442-69
CERTAIN METAL SALT COMPLEXES USEFUL FOR CONTROLLING HELMINTHS AND IMPROVING GROWTH IN ANIMALS. PATENT 3,408,444.
R L Klingbail
Us Patent Office Offic Gaz 855(5):1379
29 Oct 1968 156.65 OF2
Animal physiology, Anthelmintics, Chemical control (pests), Chemicals, Metals, Parasitism, Patents, Salts.

443-69
DIAGNOSIS AND TREATMENT OF CHRONIC SALMONELLA TYPHIMURIUM INFECTION IN SOWS.
P J Larkin M Hicks
Vet Rec 81(10):231-234
02 Sep 1967 41.8 V641
Ampicillin, Bacterial vaccines, Livestock diseases, Salmonella typhimurium, Swine.

444-69
CONTROL OF INTERNAL PARASITES OF SWINE AND SHEEP WITH DIMETHYL 2,2-DICHLOROVINYL PHOSPHATE. PATENT 3,408,443.
S H McAllister
Us Patent Office Offic Gaz 855(5):1379
29 Oct 1968 156.65 OF2
Chemical control (pests), Dichlorvos, Parasitism, Patents, Phosphates, Sheep, Swine.

445-69
GAINS FROM WORM DRENCHING EWE HOGGETS IN SOUTH CANTERBURY.
C C McLeod
New Zeal J Agr 117(4):92-93,95
Oct 1968 23 N48J
Animal physiology, Chemical control (nematodes), Dosage, Economics, Parasitism, Productivity, Sheep, Tables (data), Thiazolyl-benzimidazole, 2-(4-, Wool.

446-69
AGRICULTURAL CONTROL MEASURES AGAINST INTESTINAL PARASITES IN CATTLE.
D Oostendorp H E Harmsen
Neth J Agr Sci 16(3):177-185 REF
1968 12 N3892
Agriculture, Cattle, Drug therapy, Intestines, Nematodes, Parasitism.

447-69
THE INCIDENCE OF DISEASE RESULTING FROM INFECTION WITH HAEMONCHUS CONTORTUS IN SHEEP SENT TO THE VETERINARY INVESTIGATION CENTRES IN ENGLAND AND WALES FROM 1965 TO 1967.
J H Rose
Vet Rec 83(23):578-581 REF

07 Dec 1968 41.8 V641
Gastroenteritis, Haemonchus contortus, Livestock diseases, Nematodes, Parasitism, Sheep, Surveys.

448-69
THE LIFE SPAN OF FASCIOLA HEPATICA IN CATTLE.
J G Ross
Vet Rec 82(21):587
25 May 1968 41.8 V641
Cattle, Fasciola hepatica, Fascioliasis, Liver diseases, Longevity, Parasitism, Trematoda.

449-69
ANTHELMINTIC EFFECT OF SALICYLANILIDE PREPARATION ON COMMON LIVER FLUKES. (JA)
M Taniguchi et. al.
Tokyo Soc Vet Zootech Sci J (14|15):69-75 REF
Dec 1965 41.9 T574
Anthelmintics, Liver, Salicylanilides.

450-69
STUDIES ON VIBRIONIC INFECTION OF SHEEP AND CARRION CROWS.
W A Watson D Hunter R Bellhouse
Vet Rec 81(10):220-226 REF
02 Sep 1967 41.8 V641
Abortion, Crows, Livestock diseases, Serological tests, Sheep, Veterinary medicine, Vibrio fetus bacterins.

COMMODITY PROTECTION

451-69
FLUORODENSITOMETRIC MEASUREMENT OF AFLATOXIN THIN LAYER CHROMATOGRAMS.
A C Beckwith L Stoloff
Ass Offic Anal Chem J 51(3):602-608 REF
May 1968 381 AS7
Aflatoxin, Chemistry, Chromatography, Fluorometry, Food contamination, Measurement.

452-69
FLY AND ECONOMIC EVALUATION OF URBAN REFUSE SYSTEMS. PART II. AN EFFICIENCY ANALYSIS OF PAPER BAG CONTAINERS.
P A Rogers G J Bellenger
Calif Vector Virus 14(5):29-36
May 1967 449.8 C12
Costs, Economics, Paper containers, Pest control, Refuse disposal.

453-69
STAINING TECHNIQUE TO DIFFERENTIATE INSECT FRAGMENTS, BIRD FEATHERS, AND RODENT HAIRS FROM PLANT TISSUE.
R Stein W V Eisenberg P M Jr. Brickey
Ass Offic Anal Chem J 51(3):513-518
May 1968 381 AS7
Birds, Chemistry, Feathers, Food sanitation, Foreign bodies, Hair, Insects, Rodents, Tissues.

STORAGE DISEASES

454-69
EFFECT OF WARMING CYCLES DURING STORAGE ON THE BEHAVIOR OF JONATHAN AND GRANNY SMITH APPLES IN COOL STORAGE.
E T Carroll
Plant Protect Abs 4:196
Sep 1968 241.75 P69
Apples, Storage, Storage diseases, Temperature, Queensland Journal of Agricultural and Animal Science, 24(1):49-58, 1967.

MICROBIAL CONTAMINATION

455-69

COLLABORATIVE STUDY OF A QUANTITATIVE METHOD FOR CLOSTRIDIUM PERFRINGENS IN FOODS.
H E Hall

Ass Offic Anal Chem J 51(6):1338-1341

Nov 1968 381 AS7

Clostridium perfringens, Food contamination, Microbiology.

456-69

SURVEY OF GREEN COFFEE FOR POTENTIAL AFLATOXIN CONTAMINATION.

C P Levi E Borker

Ass Offic Anal Chem J 51(3):600-602

May 1968 381 AS7

Aflatoxin, Coffee, Food contamination, Surveys.

457-69

FALSE-POSITIVE COAGULASE REACTIONS IN THE CHARACTERIZATION OF MICROORGANISMS ISOLATED FROM FOODS.

C J Litkenhous E F Baer M M Gilden M B Bromer

Ass Offic Anal Chem J 51(1):1-3

Jan 1968 381 AS7

Coagulase, Ethylenediaminetetraacetic acid, Food analysis, Heparin, Microbiology, Rabbits, Staphylococcus aureus, Storage diseases.

458-69

ANALYSIS FOR AFLATOXIN M IN MILK.

M S Masri J R Page V C Garcia

Ass Offic Anal Chem J 51(3):594-600 REF

May 1968 381 AS7

Aflatoxin, Food contamination, Milk, Toxicology.

459-69

RETAILING OF BARBECUED CHICKENS: A CANADIAN SURVEY.

H Pivnick I E Erdman G Micklea D Connolly A Loit R Hill A Mak

Can J Public Health 59(10):380-384 REF

Oct 1968 449.8 P964

Chickens, Clostridium perfringens, Food contamination, Retail marketing, Salmonella, Surveys.

460-69

SOLID STATE FLUORESCENCE EMISSION OF AFLATOXINS ON SILICA GEL.

J A Robert W A Jr. Pons

Ass Offic Anal Chem J 51(6):1190-1192

Nov 1968 381 AS7

Aflatoxin, Fluorescence, Food contamination, Microbiology, Silica gels.

461-69

IMMUNOFLUORESCENT SCREENING FOR SALMONELLA IN FOODS: COMPARISON WITH CULTURE METHODS.

S J Schulte J S Witzeman W M Hall

Ass Offic Anal Chem J 51(6):1334-1338 REF

Nov 1968 381 AS7

Fluorescent antibody technic, Food contamination, Immunochemistry, Salmonella.

462-69

NOTE ON ANALYSIS OF AFLATOXINS IN GREEN COFFEE.

P M Scott

Ass Offic Anal Chem J 51(3):609

May 1968 381 AS7

Aflatoxin, Chemistry, Coffee, Food contamination.

463-69

RETAILING OF BARBECUED CHICKENS: A SURVEY IN BRITISH COLUMBIA.

R G Scott

Can J Public Health 59(10):385-388

Oct 1968 449.8 P964

Chickens, Food contamination, Gastroenteritis, Human diseases, Retail marketing, Salmonella typhimurium, Surveys.

464-69

NOTE ON THE SIMULTANEOUS USE OF POLYVALENT H AND SPICER-EDWARDS H ANTISERA AS A PRELIMINARY STEP IN THE IDENTIFICATION OF SALMONELLAE.

T J Wazenski K J Rhodes E C Robinson

Ass Offic Anal Chem J 51(3):718-719

May 1968 381 AS7

Food contamination, Salmonella, Serological tests.

ENVIRONMENTAL CONTAMINATION

465-69

POLLUTION COSTS MONEY.

Engineering 206(5352):708

15 Nov 1968 290.8 EN322

Air pollution, Economics, Environment, Equipment, Industrial management, Legislation, Waste, Water pollution.

466-69

DEFENSE POSSIBILITIES OF SOCIETY AGAINST POLLUTION OF FOOD AND ENVIRONMENT. (FR)

E G Peters

Vitalst- Zivilisationskrankheiten 13(1):14-15

Feb 1968 389.8 V836

Air pollution, Environment, Food contamination, Legislation, Radioactivity, Tobacco, Water pollution. This is a continuation of an article from no. 6, 1967 and will be continued in no. 2, 1968.

467-69

OBJECTIVES AND ROLE OF THE WATER POLLUTION CONTROL ADMINISTRATION ON WATER QUALITY STANDARDS.

H C Ray

Soil Conserv Soc Amer Proc 22:185-186

13 Aug 1967 56.9 SO33P

Legislation, Public health, Water analysis, Water pollution.

468-69

ARE FERTILIZERS CREATING POLLUTION PROBLEMS.

G E Smith

Soil Conserv Soc Amer Proc 22:108-114 REF

13 Aug 1967 56.9 SO33P

Fertilizers, Nitrogen, Nutrition, Soil contamination, Tables (data), Water analysis, Water pollution.

469-69

EFFECT OF AGRICULTURE ON NITRATE POLLUTION OF GROUNDWATER.

B A Stewart F G Viets G L Hutchinson

Soil Conserv Soc Amer Proc 22:115-118

13 Aug 1967 56.9 SO33P

Agriculture, Groundwater, Livestock, Nitrates, Research, Toxins, Water analysis, Water pollution.

470-69

NOTE ON THE EFFECT OF WATER ON SOXHLET EXTRACTION OF SOME ORGANOCHEMICAL INSECTICIDES FROM SOIL AND COMPARISON OF THIS METHOD WITH THREE OTHERS.

I H Williams

Ass Offic Anal Chem J 51(3):715-717

May 1968 381 AS7

Dichloro-2,2-bis(p-chlorophenyl) ethylene, 1,1-, Dieldrin, DDT, Heptachlor, Heptachlor epoxide, Insecticide residues, Methodology, Soil contamination, Water.

RESIDUES

471-69

MONITORING FOR CHLORINATED HYDROCARBON INSECTICIDE RESIDUES IN SOYBEANS- 1966.

Pest Mont J 2(1):58-67

Jun 1968 SB951.A1P41

Chlorine, Crop rotation, Dieldrin, DDT, Endrin, Hydrocarbons, Insecticide residues, Seeds, Soils, Soybeans, Translocation.

472-69

PESTICIDES AND PERSPECTIVE.

T M Barnes

Plant Protect Abs 4:186

Sep 1968 241.75 P69

Chemicals, Crop yields, Food plants, Pesticide residues, Pesticides. Chemistry and Industry, no. 24, June 15, 1968, p.749.

473-69

EXCRETION AND STORAGE OF DIELDRIN IN DAIRY COWS FED THYROPROTEIN AND DIFFERENT LEVELS OF ENERGY.

D G Braund L D Brown J T Huber N C Leeling

M J Zabik

J Dairy Sci 52(2):172-182 REF

Feb 1969 44.8 J822

Dairy cattle, Dieldrin, Diet, Energy, Excreta, Food contamination, Pesticide residues, Storage, Thyroprotein.

474-69

DETERMINATION OF ARSENIC IN ORGANIC ARSONATES.

W F Carey

Ass Offic Anal Chem J 51(6):1300-1301

Nov 1968 381 AS7

Arsenic compounds, Assay, Herbicides, Organic compounds.

475-69

PESTICIDE RESIDUE LEVELS IN FOODS IN THE UNITED STATES FROM JULY 1, 1963, TO JUNE 30 1967.

R E Duggan

Pest Mont J 2(1):2-46

Jun 1968 SB951.A1P41

Chemicals, Feed, Food, Legislation, Pesticide residues, Tables (data).

476-69

RAPID CLEANUP FOR CARBARYL, USING CHANNEL LAYER CHROMATOGRAPHY.

L J Jr. Faucheuy

Ass Offic Anal Chem J 51(3):676-678

May 1968 381 AS7

Carbaryl, Chemistry, Chromatography, Insecticides, Pesticide residues.

477-69

DDT RESIDUES ON PASTURE AND IN THE BUTTERFAT OF COWS GRAZING PASTURE TREATED WITH DDT PRILLS AND DDTSU-PERPHOSPHATE. (ABSTRACT).

D L Harrison J N Collett C J Christie

Pesticide Progr 5(3):73

May 1967 79.8 P434

Ddt, Dairy cattle, Grazing, Insecticide residues, Insecticides, Milk fat, Pastures, Toxicology. This was author's abstract from New Zealand Jour. Agric. Res. 8(2):223-231. 1965.

478-69

FINDINGS CONCERNING NOURISHMENT AND TOXIC RESIDUES IN PLANTS, OTHER HEALTH HAZARDS AND LIFE THREATS. (GE)

H Itzerott

Gesunde Pflanzen 20(1):15-17

Jan 1968 464.8 G33

Agricultural chemistry, Field crops, Nutrition, Pesticide residues, Poisoning, Public health, Toxicology.

479-69

TOLERANCE AND EXEMPTIONS FROM TOLERANCES FOR PESTICIDE CHEMICALS IN OR ON RAW AGRICULTURAL COMMODITIES. O,ODIETHYL S-2-(ETHYLTHIO) ETHYL PHOSPHORODITHIOATE.

J K Kirk

Fed Regist 34(21):1553-1554

31 Jan 1969 L1.451

Agricultural products, Disulfoton, Feed, Forage plants, Insecticide residues, Pesticides, Sorghum.

480-69

EFFECT OF VARIOUS PHYSICAL TREATMENTS ON CERTAIN ORGANOCHLORINE HYDROCARBON INSECTICIDES FOUND IN MILK FAT.

M Kroger

J Dairy Sci 51(2):196-198 REF

Feb 1968 44.8 J822

Chlorinated hydrocarbons, Deodorizing, Dieldrin, Freeze drying, Heat, Heptachlor, Insecticide residues, Milk fat.

Abstract: Drying and mild deodorization treatments were not effective. More severe deodorization reduced the insecticide levels significantly; as did heating at very high temperatures.

481-69

DIELDRIN RESIDUE IN AN ORCHARD-DAIRY AREA OF WISCONSIN.

R J Moubry G R Myrdal H E Halliday

Pest Mont J 2(1):51-54

Jun 1968 SB951.A1P41

Chemical control (insects), Dairy cattle, Dieldrin, Insecticides, Milk, Milk analysis, Orchards, Pesticide residues.

482-69

OFFICIAL FDA TOLERANCES.

Nat Agr Chem Ass News Pesticide Rev 26(3):3-27

Feb 1968 421 AG8

Agricultural regulation, Crops, Fish, Fruit, Meat, Pesticide residues, Pesticides, Poultry, Tolerances, Vegetables.

483-69

THE USE OF GAS CHROMATOGRAPHY IN DETECTING LINDANE IN SEWAGE EFFLUENT.

H A Nelson

U S Agr Res Serv ARS- (70):41

Dec 1968 A41.9 R315AR

Chromatography, Hydrocarbons, Insecticide residues, Lindane, Quantitative analysis, Sewage disposal, Sludge.

484-69

EFFECT OF DDT ON TEMPERATURE SELECTION BY YOUNG ATLANTIC SALMON, SALMON SOLAR. (ABSTRACT).

D M Ogilvie J M Anderson

Pesticide Progr 5(3):76

May 1967 79.8 P434

DDT, Dosage, Pesticide residues, Salmon, Temperature. This was the authors abstract taken from Jour. Fish. Res. Board of Canada 22 (2): 503-512. 1965.

485-69

AUTOMATED ANALYSIS OF ORGANOPHOSPHORUS INSECTICIDES BY WET DIGESTION-OXIDATION AND COLORIMETRIC DETERMINATION OF THE DERIVED ORTHOPHOSPHATE.

D E Ott F A Gunther

Ass Offic Anal Chem J 51(3):697-708 REF

May 1968 381 AS7

Chromatography, Colorimetry, Crops, Hydrolysis, Insecticide residues, Organophosphorus compounds, Spinach, Strawberries.

486-69

COLLABORATIVE STUDY OF THE THIN LAYER CHROMATOGRAPHIC METHOD FOR CARBARYL RESIDUES IN APPLES AND SPINACH.

N J Palmer W R Benson

Ass Offic Anal Chem J 51(3):679-681

May 1968 381 AS7

Apples, Carbaryl, Chromatography, Insecticides, Pesticide residues, Research, Spinach.

487-69

RESIDUES OF PARATHION AND METHYL-PARATHION IN POTATO TUBERS AND IN THE SOIL, FOLLOWING SOIL TREATMENTS. (FR)

A Polizu M Roman F Manolache Gh Boguleanu

T Sapunaru M Peiu

Qualitas Plant Water Veg 15(4):380-386

10 Jul 1968 64.8 M41

Chemical control (pests), Methyl parathion, Parathion, Pesticide residues, Potato-tuber, Precipitation, Soil treatment, Toxins. French and German summary.

488-69

DDT STORAGE IN THE U. S. POPULATION. (ABSTRACT).

G E Quinby W J Hayes J F Armstrong W F

Durham

Pesticide Progr 5(3):77

May 1967 79.8 P434

DDT, Demography, Ethylene, Fats, Humans, Insecticide residues, Storage. This was the author's abstract from Jour. Amer. Med. Assoc. 191:175-179. 1965.

489-69

ISOLATION AND DETERMINATION OF CHLOROHYDRINS IN FOODS FUMIGATED WITH ETHYLENE OXIDE OR WITH PROPYLENE OXIDE.

E P Ragelis B S Fisher B A Klimeck C Johnson

Ass Offic Anal Chem J 51(3):709-715

May 1968 381 AS7

Chlorohydrins, Ethylene oxide, Food, Fumigation, Pesticide residues, Propylene oxide.

490-69

EFFECT OF ATRAZINE ON OATS (AVENA SATIVA VAR. MINHAFAER) I AND II. (ABSTRACT).

R H Shimabukuro

Pesticide Progr 5(3):79

May 1967 79.8 P434

Adsorption, Atrazine, Culture media, Insecticide residues, Oats, Plant translocation, Seedlings. This was the author's abstract taken from Diss. Abstr. 26: 2397-2398. 1965.

491-69

EXTRACTION AND CLEANUP PROCEDURE FOR THE DETERMINATION OF ORGANO-THIOPHOSPHATE PESTICIDE RESIDUES IN VEGETABLES AND FRUITS BY THIN LAYER CHROMATOGRAPHY AND GAS LIQUID CHROMATOGRAPHY.

A M S Silva Fernandes T Reis e Sousa M C de

Barros

Rev Agron (Lisboa) 50(4):266-274 REF

1967 15.5 R32

Chemistry, Chromatography, Extracts, Fruit, Organic compounds, Pesticide residues, Pesticides, Plant extracts, Thiophosphates, Vegetables. Portuguese summary

492-69

LONG-TERM MOVEMENT OF DDT APPLIED TO SOIL FOR TERMITE CONTROL.

V K Smith

Pest Mont J 2(1):55-57

Jun 1968 SB951.A1P41

Chemical control (insects), DDT, Insecticide residues, Soil analysis, Termites, Translocation.

493-69

ESTABLISHMENT OF TOLERANCES FOR PESTICIDE RESIDUES. (FR)

M J de Sousa Lobo

Rev Agron (Lisboa) 50(4):281-288 REF

1967 15.5 R32

Agricultural products, Dosage, Fumigation, Health, Legislation, Pesticide residues, Tolerances, Toxicity.

494-69

PERSISTENCE OF CHLORINATED HYDROCARBON INSECTICIDE RESIDUES IN CHICKEN TISSUES AND EGGS. (ABSTRACT).

W J Stadelman B J Liska B E Langlois G C

Mostert A R Stemp

Pesticide Progr 5(3):80

May 1967 79.8 P434

Chickens, DDT, Dieldrin, Eggs, Feed, Heptachlor, Insecticide residues, Lindane, Tissues. This was the author's abstract taken from Poultry science 44 (2): 435-437. 1965.

495-69

PARATHION RESIDUE IN CURED ALFALFA.

L L Stitt

Agrichem West 11(9):8,10

Sep 1968 381 AG85

Alfalfa, Chemical control (pests), Curing, Insecticide application, Insecticide residues, Parathion, Sampling.

496-69

PESTICIDE RESIDUES IN OINTMENT BASES OF NATURAL ORIGIN. (GE)

H-p Thier

Deut Apoth- Zeitung 108(45):1799-1801 REF

07 Nov 1968 396.8 SU2

Benzene hexachloride, Chlorinated hydrocarbons, Chromatography, Insecticide residues, Oils, Organophosphorus compounds, Plant protection, Toxicology.

497-69

REDUCTION OF PARATHION RESIDUE ON CELERY.

N P Thompson

Sunshine State Agr Res Rep 13(5-6.SEP-NOV):3-4

1968 100 F66SU

Celery, Crop yields, Hydrogen peroxide, Insect pests, Insecticide residues, Parathion, Plant physiology, Plant protection, Potassium hydroxide.

498-69

IMPROVED GLC METHOD FOR S-TRIAZINE RESIDUE DETERMINATION.

R C Tindle C W Gehrke W A Aue

Ass Offic Anal Chem J 51(3):682-688 REF

May 1968 381 AS7

Atrazine, Chromatography, Corn, Herbicides, Pesticide residues, Prometryne, Propazine, Simazine, Soil contamination, Triazines, Water pollution.

499-69

A CONSIDERATION OF INSECTICIDE EFFECTS ON HYPOTHETICAL AVIAN POPULATIONS.

H Young

Ecology 49(5.SUMMER):991-994 REF

1968 410 EC7

Birds, Breeding, Chemical control (insects), Immunity, Insecticide residues, Insecticides, Mortality, Population, Sterility.

500-69

FACTORS INFLUENCING THE SELECTIVITY OF HERBICIDES.

W Van Der Zweep

Wageningen Inst Biol Schiek Ond Landb Med

(3):197-204 REF

09 Mar 1967 60.9 W123

Carbamates, Endothal, Herbicides, Pesticide application, Pesticide residues, Plant physiology, Pyrazon plus lenacil, Soils, Sugar beets, Tolerances, Urca. German summary.

TOXICOLOGY

501-69

DRUGS - THEIR USE AND ABUSE.

Pig Farming 16(10):63-69

Oct 1968 46.8 P623

Antibiotics, Biochemistry, Drugs, Research, Toxicology.

502-69

DIELDRIN EFFECTS IN TWO GENERATIONS OF PENNED HEN PHEASANTS.

W L Baxter R L Linder R B Dahlgren

J Wildlife Manage 33(1):96-102

Jan 1969 410 J827

Behaviorism, Chlorinated hydrocarbons, Dieldrin, Eggs, Fertility, Food consumption, Mortality, Pheasants, Physiology, Tables (data).

503-69

HOUSEHOLD INSECTICIDES.

W H Bennett

Pest Contr Oper News 27(8):19-22

Aug 1967 SB951.A1P4

Accident prevention, Chemical control (pests), Household pests, Insect pests, Insecticides, Tables (data), Toxicology. 22 insecticides are listed with their chemical makeup, toxicity, uses, and precautions.

504-69

THE SITUATION REGARDING THE USE OF ALDRIN AND DIELDRIN IN EUROPE. (GE)

F Bcran

Pflanzenarzt 20(5):46-49

01 May 1967 464.9 P482

Aldrin, Dieldrin, Insecticides, Legislation. List of permitted and prohibited use of the two insecticides.

505-69

POTENTIATION OF TOXICOLOGY OF SUMITHION BY PHOSPHAMIDON IN THE RAT. (ABSTRACT).

P E Braid M Nix

Excerpta Med Pharm Toxicol 21(11):550

Nov 1968 241.64 EX23

Bayer 41831, Pesticides, Phosphamidon, Rats, Toxicology. From Canadian Journal of Physiology. 1968, 46/2, (133-137).

506-69

SAFE USE OF PESTICIDES.

Pesticide Progr 5(3):68-71

May 1967 79.8 P434

Accident prevention, Lethal factor, Pesticide application, Pesticides, Toxicology. Reprinted from Planter's Bulletin 82: 19-22. 1966.

507-69

THE TOXICITY OF FLY ASH FOR CATTLE. (CZ)

M Ferencik J Kubinec A Mraz M Halasa E

Hurtik V Tencer

Czech Min Zemed Les Hospod Ustav Vedeckotech Inform Vet Med 13(1):37-46 REF

Jan 1968 41.9 C333

Arsenic, Biochemistry, Cattle, Hair, Meat, Milk, Toxins, Viscera. English, Russian, and German summaries

508-69

MACROZAMIA POISONING.

P J Healy

Inst Vet Insp New S Wales Vet Insp Annu 31:33

1967 41.9 IN73

Livestock diseases, Macrozamia, Poisoning, Toxicology.

509-69

THE USE OF ORGANIC TIN COMPOUNDS FUNGICIDES IN AGRICULTURE, LOOKED AT FROM THE TOXICOLOGICAL POINT OF VIEW. (GE)

O R Klimmer

Pflanzenschutzberichte 37(4/6):57-66 REF

Mar 1968 464.9 P48

Agriculture, Antiseptics, Bactericides, Fentin acetate, Fungicides, Organotin compounds, Plant protection, Residues, Toxicology. English summary.

510-69

EFFECTS OF 2,4-D ON EMERGENCE AND SEEDLING GROWTH OF RANGE GRASSES.

G J Klomp A C Hull

J Range Manage 21(2):67-70

Mar 1968 60.18 J82

Agropyron, Bromus, Chemical control (weeds), D, 2,4-, Grasses, Herbicides, Madia, Toxicology.

511-69

SUSPECTED SODIUM FLUOROACETATE POISONING IN SHEEP AND CATTLE.

J W Plant

Inst Vet Insp New S Wales Vet Insp Annu 31:83-86

1967 41.9 IN73

Cattle, Poisoning, Sheep, Sodium fluoroacetate, Toxicology.

512-69

STUDIES OF TOXICITY AND ENZYME ACTIVITY RESULTING FROM INTERACTION BETWEEN CHLORINATED HYDROCARBON AND CARBAMATE INSECTICIDES. (ABSTRACT).

C H Williams J L Casterline K H Jacobson

Excerpta Med Pharm Toxicol 21(11):549-550

Nov 1968 241.64 EX23

Aldrin, Carbamates, Chlordane, Chlorine, Enzymes, Hydrocarbons, Insecticides, Rats, Toxicology. From Toxicology and Applied Pharmacology. 1967, 11/2, (302-307).

PLANT PHYSIOLOGY & BIOCHEMISTRY

513-69

STERILIZATION MAKES THE MOSQUITO HUNGRY.

Plant Protect Abs 4:203-204

Sep 1968 241.75 P69

Culicidae, Insect physiology, Sterilization. New Scientist, vol. 39, no. 604, July 4, 1968, p.23.

514-69

SHIFTS IN DISEASE RESISTANCE INDUCED BY GROWTH REGULATORS.

O M van Andel

Wageningen Landbouw Lab Fytopathol Med (239):113-120 REF

1968 464.04 W12

Cladosporium cucumerinum, Cucumbers, Fungus diseases (plants), Indoleacetic acid, Plant biochemistry, Plant disease resistance, Plant physiology, Plant regulators, Seedlings. Reprint from Neth. J. Pl. Path. 74(1968 Suppl. 1):113-120.

515-69

SHORT-TERM GROWTH RESPONSE TO GROWTH REGULATORS IN ROOTS OF ZEA MAYS.

D E Bottrill J B Hanson

Australian J Biol Sci 21(2):201-208 REF

Apr 1968 442.8 AU72

Corn, D, 2,4-, Indoleacetic acid, Plant anatomy, Plant growth inhibitors, Plant regulators, Roots, Trichlorophenoxyacetic acid, 2,4,6-.

516-69

CHEMICAL AIDS FIGURE IN PLANT PROPAGATORS' REPORTS.

J H Clarke

Amer Nurseryman J 128(11):12,43-50

01 Dec 1968 80 AM371

Chemicals, Nurseries, Pesticides, Picea parryana, Plant biochemistry, Plant cuttings, Plant regulators, Reports.

517-69

EFFECTS OF GIBBERELIC ACID ON FLOWER THINNING AND BLOOM DELAY OF STONE FRUITS.

J N Corgan

Agrichem West 11(9):6

Sep 1968 381 AG85

Biochemistry, Flowers, Fruit, Fungus diseases (plants), Gibberellic acid, Plant physiology, Plant regulators, Pruning, Spraying, Thinning (fruit).

518-69

MANGANESE TOXICITY IN TOMATO SEEDLINGS.

D J Dennis

New Zeal J Agr 117(4):118-119

Oct 1968 23 N48J

Fertilizers, Lime, Manganese, Plant physiology, Seedlings, Soil analysis, Tissues, Tomatoes, Toxins.

519-69

TRANSLOCATION OF SYSTEMIC FUNGICIDES.

L V Edgington

Plant Protect Abs 4:188-189

Sep 1968 241.75 P69

Biochemistry, Fungicides, Plant physiology, Plant translocation. First International Congress of Plant Pathology, London 14-26 July, 1968.

520-69

NEW DEVELOPMENTS IN HYBRID BARLEY RESEARCH.

A E Foster

Northwest Crop Produc Conf Rep 1967

MEETING:34-36

1967 464.9 N813

Barley, DDT, Plant breeding, Plant genetics, Plant injuries.

521-69

INHIBITION OF PHOTOSYNTHETIC ELECTRON TRANSPORT BY IOXYNIL.

J Friend R Olsson

Nature 214(5059):942-943

27 May 1967 472 N21

Biochemistry, Broadbeans, Chloroplasts, Electron transport, Herbicides, Hill reaction, Ioxynil, Leaves, Oxygen, Photosynthesis, Research.

522-69

EFFECT OF BORON TOXICITY ON SOME LEAF CONSTITUENTS IN GROUNDNUT (ARACHIS HYPOGAEA, LINN.) PLANTS.

N H Gopal I M Rao

Andhra Agr J 15(1):21-24 REF

1968 34.2 AN4

Boron, Chlorosis, Leaves, Micronutrients, Peanuts, Plant biochemistry, Plant physiology.

523-69

GROWTH OF SCLEROTIUM ROLFII AT DIFFERENT CONCENTRATIONS OF OXYGEN AND CARBON DIOXIDE.

D M Griffin N G Nair

J Expt Bot 19(61):812-816

Nov 1968 450 J8224

Atmosphere, Carbon dioxide, Cowpeas, Diffusion, Fungus diseases (plants), Gases, Oxygen, Plant regulators, Sclerotium rolfsii.

524-69

MORPHOLOGICAL CHANGES IN WHEAT CAUSED BY THE ACTION OF CHLORCHOLINCHLORIDE-CCC. (SE)

R Grupe R Lozanovski A Gudevski E Lozinska

Agrohemija (516):175-181 REF

1968 385 AG87

Biochemistry, Chloroethyltrimethylammonium chloride, (2-, Dosage, Fertilizers, Nitrogen, Plant morphology, Plant physiology, Research, Wheat. English summary.

525-69

THE CULTURE OF PHYTOPHTORA INFESTANS ON FULLY SYNTHETIC CULTURE MEDIUM SUBSTRATA. (GE)

H Henniger

Zeitsch Allg Mikrobiol 3(2):126-135 REF

May 1963 QR1.24

Agar, Biochemistry, Culture media, Fungi, Growth factors, Microbiology, Phytophthora infestans, Substrates.

526-69

CONCURRENT MICROSCOPICAL, CYTOCHEMICAL AND ELECTRON MICROSCOPICAL STUDY ON THE CELL POLARITY OF Equisetum SPORE MOTHER CELLS IN SYNDETIC STAGE.

T Hiraoka

Koto Univ Fac Sci Mem Ser Biol (N S) 1(1):1-7

REF

Oct 1967 QH301.K9

Cells, Chemistry, Cytology, Electron microscopes, Equisetum, Microscopy, Research, Spores.

527-69

527-69

THE INFLUENCE OF PLANT-GROWTH FACTORS ON THE INITIATION AND GROWTH OF CROWN-GALL TUMOURS ON PRIMARY PINTO BEAN LEAVES.

M D E Khalifa J A Lippincott

J Expt Bot 19(61):749-759 REF

Nov 1968 450 J8224

Agrobacterium tumefaciens, Beans, Biochemistry, Crown galls, Kidney beans, Leaves, Plant physiology, Plant regulators.

528-69

GROWTH OF PLANTED CHESTNUT TREES (CASTANEA CRENATA) IN RELATION TO SOIL NUTRIENTS IN KOREA. (CH)

C M Kim

Seoul Univ J Biol Agr Ser (b) (SER B)18:1-9

REF

Sep 1967 442.9 SO84

Castanea, Plant nutrition, Plant physiology, Soil analysis, English summary

529-69

EFFECT OF SEVERAL GROWTH REGULATORS AND TEMPERATURE TREATMENT TO RICE SEED ON THE GERMINATION AND INITIAL GROWTH OF SEEDLING.

K H Kim H S Sohn E W Lee

Seoul Univ J Biol Agr Ser (b) (SER B)18:83-96

REF

Sep 1967 442.9 SO84

Cold, Herbicides, Plant physiology, Plant regulators, Rice, Seed germination, Seed treatment, Chinese summary

530-69

GA INCREASES TANGELO YIELDS.

A H Krezdorn

Sunshine State Agr Res Rep 13(5-6,SEP-NOV):16

1968 100 F66SU

Biochemistry, Crop yields, Gibberellic acid, Plant regulators, Pollination, Research, Tangelos.

531-69

EFFECT OF GIBBERELIC ACID ON GAMMA IRRADIATED BARLEY SEEDS.

S Kumar

Indian J Genet Plant Breeding 27(1):154-156

REF

Mar 1967 64.8 IN2

Barley, Chromosomes, Gamma rays, Gibberellic acid, Irradiation, Plant genetics, Plant injuries, Plant regulators, Seedlings.

532-69

EFFECT OF ECDYSONE ON THE PUPARIUM FORMATION IN IRRADIATED EPHESTIA KUHNIELLA Z.

A M Kuzin I K Kolomijteva N I Yusifov

Nature 217(5130):743-744

24 Feb 1968 472 N21

Deoxyribonucleic acid, Ecdysone, Ephestia, Gamma rays, Insect physiology, Pupae, Ribonucleic acid, X-rays.

533-69

EFFECT OF NITROGEN, SILICON AND THEIR INTERACTION ON THE AGRONOMIC CHARACTERS IN PADDY RICE.

C Lee E Woong

Seoul Univ J Biol Agr Ser (b) (SER B)18:97-117

REF

Sep 1967 442.9 SO84

Chemical reactions, Crop yields, Nitrogen, Plant physiology, Rice, Silicon. Chinese summary

534-69

IDENTIFICATION OF GIBBERELLINS IN CRUDE PLANT EXTRACTS BY COMBINED GAS CHROMATOGRAPHY-MASS SPECTROMETRY.

J MacMillan R J Pryce G Eglinton A McCormick

Tetrahedron Lett (24):2241-2243

Jun 1967 385 T29

Biochemistry, Chromatography, Gibberellins, Plant extracts, Scarlet runner beans, Seedlings, Spectrometry.

535-69

STUDY OF THE INTERACTION OF GROWTH RETARDANTS AND A VIRUS ON THE GROWTH OF PRUNUS PERSICA LINE GF 305.

C Marenaud

Plant Protect Abs 4:194

Sep 1968 241.75 P69

Peaches, Plant growth inhibitors, Plant physiology, Research, Virus diseases (plants). Meeting of the Academy of Agriculture of France, 23 Nov. 1966.

536-69

STUDIES ON WHEAT PLANTS USING ¹⁴C-LABELLED COMPOUNDS. XXII. INCORPORATION INTO WHEAT PROTEIN.

W B McConnell

Can J Biochem 47(1):19-23 REF

Jan 1969 470 C16E

Amino acids, Arginine, Carbon isotopes, Glutamic acid, Glutamine, Micronutrients, Plant biochemistry, Plant physiology, Plant proteins, Proline, Succinic acid, Wheat.

537-69

INFLUENCE OF SOME AMINOTRIAZINE HERBICIDES ON SOME SOIL FUNGI. (IT)

M Mickovski O Verona

Pisa Univ Ist Patol Veg Microbiol Agr Tec (mem)

(500,MAR-APR):67-76

1967 464.9 P67

Atrazine, Carbon, Herbicides, Nitrogen, Prometryne, Simazine, Soil fungi. English summary. extract from Italian Agriculture.

538-69

EFFECT OF HORMONES ON THE SUGAR LEVEL OF MAIZE (ZEA MAYS L.) PLANTS.

R V Misra H Shanker A N Pathak

Madras Agr J 55(4):182-185 REF

Apr 1968 22 M262

Biochemistry, Corn, Gibberellic acid, Hormones, Plant physiology, Seed treatment, Sucrose, Sugars.

539-69

EFFECT OF SOIL FERTILITY ON THE DISTRIBUTION OF PLANT COMMUNITIES AS SHOWN BY POT CULTURES AND FIELD TRIALS.

B N Richards

Commonwealth Forest Rev 47(133):200-210 REF

Sep 1968 99.8 EM72

Greenhouse culture, Plant geography, Plant physiology, Plants, Soil fertility, Soils.

540-69

INHIBITION OF FLOWERING IN HYOSCYAMUS NIGER BY 6-AZARACIL WITHOUT SUPPRESSION OF STEM GROWTH.

F Seidlova K Krekule L Teltscherova

Nature 214(5093):1146-1147

10 Jun 1967 472 N21

Biochemistry, Cells, Hyoscyamus, Leaves, Photoperiodism, Plant abnormalities, Plant growth inhibitors, Plant physiology, Pyrimidines, Reproduction, Uracils.

541-69

STUDIES ON THE MECHANISM OF INJURIOUS EFFECTS OF TOXIC GASES ON CROP PLANTS. I. RELATION BETWEEN THE CONCENTRATION OF SULFUR DIOXIDE AND THE DEGREE OF LEAF INJURIES IN SEVERAL CROPS.

T Taniyama H Arikado

Crop Sci Soc Japon Proc 37(3):366-371 REF

Sep 1968 22.5 C88

Alsike clover, Barley, Dactylis, Fumigation, Gases, Plant injuries, Research, Rice, Sulfur dioxide, Tobacco, Toxins. English summary.

542-69

EFFECTS OF GIBBERELLIN ON PHOTOSYNTHESIS IN RED CLOVER (TRIFOLIUM PRATENSE L.).

K J Treharne J L Stoddart

Nature 220(5166):457-458

02 Nov 1968 472 N21

Absorption, Gibberellins, Leaves, Photosynthesis, Plant biochemistry, Plant hormones, Red clover, Tables (data).

543-69

ON THE ANTIBIOTICALLY ACTIVE SUBSTANCES OF THE TULIP (TULIPA GESNERIANA). (GE)

R Tschesche F J Kammerer G Wulff F

Schonbeck

Tetrahedron Lett (6):701-706

Fch 1968 385 T29

Antibiotics, Fungicides, Hydrolysis, Lactones, Plant biochemistry, Plant disease resistance, Tulip.

544-69

THE STATUS OF SOME MICRONUTRIENTS IN HEALTHY ROBUSTA BANANA PLANTS.

I T Twyford D Walmsley

Trop Agr &st Augustine & 45(4):307-315 REF

Oct 1968 26 T754

Bananas, Boron, Copper, Diagnosis, Iron, Manganese, Micronutrients, Plant nutritional deficiencies, Plant physiology, Plant translocation, Zinc.

CHEMISTRY

545-69

COLLABORATIVE STUDY OF MICROBIOLOGICAL ASSAY OF OXYTETRACYCLINE IN FEEDS.

D C Jr. Billman H Clark

Ass Offic Anal Chem J 51(3):548-552

May 1968 381 AS7

Antibiotics, Biological assay, Chemistry, Feed, Microbiology, Oxytetracycline, Research.

546-69

GUIDE TO THE ANALYSIS OF PESTICIDE RESIDUES.

H P Burchfield

5(3):63-64

May 1967

Assay, Manuals, Pesticide residues.

547-69

MONO-ETHERS OF 2,2'-DIHYDROXYDIPHENYL SULFONE AND METHOD OF MAKING THE SULFONE AND MONO-ETHERS. PATENT 3,408,402.

R H Callaghan J O Hawthorne E L Mihelic

Us Patent Office Offic Gaz 855(5):1371

29 Oct 1968 156.65 OF2

Bactericides, Chemistry, Dihydroxydiphenyl sulfone, 2,2'-, Dyes, Ethers, Patents.

548-69

MONITORING THE ENVIRONMENT.

Pesticide Progr 5(3):64-66

May 1967 79.8 P434

Chemical control (pests), Chlorinated hydrocarbons, Pesticide residues, Pesticides.

549-69

COLLABORATIVE STUDY OF AN ULTRAVIOLET METHOD FOR MEASURING DIQUAT CONTENT IN FORMULATIONS.

A A Carlstrom

Ass Offic Anal Chem J 51(6):1304-1305

Nov 1968 381 AS7

Diquat, Formulations, Herbicides, Quantitative analysis, Ultraviolet rays.

550-69

COLLABORATIVE STUDY OF A COLORIMETRIC METHOD FOR PARAQUAT IN FORMULATIONS.

A A Carlstrom

Ass Offic Anal Chem J 51(6):1306-1309

Nov 1968 381 AS7

Colorimetry, Formulations, Herbicides, Paraquat.

551-69

QUINOLINE DERIVATIVES: PART XIX.
POTENTIAL AMOEBOICIDAL AGENTS.

S S Chakravarti U P Basu

Indian J Appl Chem 30(5-6):170-172 REF

1967 385 IN293

Amoeba, Chemical control (pests), Chemicals, Hydroxyquinoline, Thiazole.

552-69

CAROTENOID COMPOUNDS. PATENT

3,408,406.

A J Chechak C D Robeson

Us Patent Office Offic Gaz 855(5):1372

29 Oct 1968 156.65 OF2

Carotenoids, Chemicals, Chemistry, Color, Feed, Patents, Poultry.

553-69

PROCESS FOR PREPARING BIS-(3,5,6-
TRICHLORO-2-HYDROXYPHENYL)
METHANE. PATENT 3,408,408.

J W Drew W E Roscn

Us Patent Office Offic Gaz 855(5):1372

29 Oct 1968 156.65 OF2

Chemistry, Methylcnbis(3,4,6-trichlorophenol), 2,2'-, Patents, Processing.

554-69

PEROXIDASE ISOZYMES IN BARLEY LEAVES
FROM IRRADIATED SEEDS.

M Giacomelli

Nature 213(5082):1265-1266

25 Mar 1967 472 N21

Barley, Enzymes, Irradiation, Leaves, Peroxidases, Plant physiology, Radiobiology, Research, Seeds.

555-69

PROCESS FOR PRODUCING OXYTETRA-
CYCLINE ANTIBIOTIC. PATENT 3,408,258.

A Grein R Barchielli

Us Patent Office Offic Gaz 855(5):1346

29 Oct 1968 156.65 OF2

Antibiotics, Chemistry, Fermentation, Oxytetra-
cycline, Patents, Processing, Streptomyces
henetus.

556-69

INSECT RESISTANT THERMOPLASTIC COM-
POSITIONS. PATENT 3,408,323.

R J Hackney

Us Patent Office Offic Gaz 855(5):1360

29 Oct 1968 156.65 OF2

Insecticide resistant insects, Insecticides, Insects,
Patents, Plastics, Polymers, Thermochemistry.

557-69

COLLABORATIVE STUDY OF THE UL-
TRAVIOLET SPECTROPHOTOMETRIC
DETERMINATION OF SULFOXIDE IN FOR-
MULATIONS.

J B Haus L Manolev

Ass Offic Anal Chem J 51(3):562-564

May 1968 381 AS7

Chemistry, Pesticides, Research, Spec-
trophotometry, Sulfoxides, Ultraviolet rays.

558-69

SEPARATION OF PENICILLINS BY PAPER
AND THIN LAYER CHROMATOGRAPHY.

H Hellberg

Ass Offic Anal Chem J 51(3):552-557 REF

May 1968 381 AS7

Antibiotics, Chromatography, Penicillin.

559-69

FIRST REPORT OF THE REGULAR LIM-
NOLOGICAL SURVEY OF LAKE BIWA (OCT.
1965-DEC. 1966) V. ABIOTIC ENVIRONMENT.

S Horie

Koto Univ Fac Sci Mem Ser Biol (N S)I(1):95-

119

Oct 1967 QH301.K9

Environment, Limnology, Reports, Surveys, Time.

560-69

NOTE ON AFLATOXIN M₁; OPTICAL AND X-
RAY CRYSTALLOGRAPHIC DATA.

F T Jones K S Lee

Ass Offic Anal Chem J 51(3):610

May 1968 381 AS7

Aflatoxin, Chemistry, Crystallography, X-rays.

561-69

COLORIMETRIC METHOD FOR THE DETER-
MINATION OF DICHLOROVOS(DDVP).

S B Kadkol

Journeyman Baker 4(3):123

Oct 1967 389.8 J823

Chemical reactions, Chemistry, Colorimetry,
Dichlorvos, Methodology.

562-69

THE DOSAGE OF THE INSECTICIDES: DDT,
HCH AND METHOXYCHLOR FOR CHRO-
MATOGRAPHY ON A THIN LAYER AND FOR
POLAROGRAPHY. (POL

A Kotarski K Mosinska

Chem Anal 12(2):329-338 REF

1967 385 C4233

Benzene hexachloride, Chemical analysis, Chro-
matography, DDT, Dosage, Insecticides, Methox-
ychlor, Polarography, Tables (data). French sum-
mary.

563-69

COLLABORATIVE STUDY OF GAS CHRO-
MATOGRAPHIC ANALYSIS OF HEPTACHLOR
CONTENT OF FORMULATIONS.

M Malina

Ass Offic Anal Chem J 51(3):565-568

May 1968 381 AS7

Chemistry, Chromatography, Gases, Heptachlor,
Pesticides, Research.

564-69

THE OUTER LAYER OF THE CELL EN-
VELOPE OF HALOBACTERIUM HALOBIVM.

C L Marshall A J Wicken A D Brown

Can J Biochem 47(1):71-74 REF

Jan 1969 470 C16E

Assay, Bacteria, Biochemistry, Cell wall, Cells,
Chemistry, Halobacterium halobium, Proteins,
Ribonucleic acid.

565-69

ADSORPTION OF MALEIC ACID ON MERCU-
RY-ELECTROLYTE INTERFACE AND THE
PROBLEM OF PRECEDING SURFACE
RECOMBINATION.

L Pospisil J Kuta

Collect Czech Chem Commun 33(9):3040-3044

Sep 1968 385 C68

Adsorption, Chemical reactions, Electrolytes,
Kinetics, Maleic acid, Mercury compounds, Suc-
cinic acid, Surface-active agents. Translated from
Czech by K. Micka.

566-69

THE IN VITRO AND IN VIVO OXIDATION
AND HYDROLYSIS OF MALATHION BY
WHEAT GRAIN ESTERASES. (ABSTRACT).

D G Rowlands

Pesticide Progr 5(3):78

May 1967 79.8 P434

Culture media, Esterases, Hydrolysis, Malathion,
Oxidation, Wheat. This was the author's abstract
taken from *Jour. Sci. Fd. Agr.* 16 (6): 325-330.
1965.

567-69

DETERMINATION OF FLUORINE IN FEEDS
BY THE FLUORIDE ION ACTIVITY ELEC-
TRODE.

L Torma B E Ginther

Ass Offic Anal Chem J 51(6):1181-1183

Nov 1968 381 AS7

Chemistry, Electrodes, Feed, Fluorides, Fluorine,
Food analysis, Ions.

568-69

PERMISSIVE CHEMICAL.

S Viantes

Brewers J 103(1220):97

May 1967 390.8 B753

Alcoholic beverages, Chemicals, Diethylpyrocac-
bonate, Fermentation, Inhibitors, Legislation,
Malt.

569-69

O,O-DIISOPROPYL-ETHYLSULFINYL-
METHYL-DITHIOPHOSPHATE. PATENT

3,408,426.

T Yamamoto S Kobayashi K Nakatomi S

Takahashi H Ueda M Kondo

Us Patent Office Offic Gaz 855(5):1374

29 Oct 1968 156.65 OF2

Chemistry, Diisopropyl-ethylsulfinylmethyl-
dithiophosphate, O,O-, Insecticides, Patents.

ENGINEERING

570-69

CONCENTRATE SPRAYING.

J Shimmon

Agrichem West 11(9):16,18,20

Sep 1968 381 AG85

Economics, Industry, Nozzles, Particle size deter-
mination, Spraying equipment.

571-69

FOR SAFER ULV SPRAYING.

D B Smith E C Burt

Farm Chem 131(10):62,64

Oct 1968 57.8 AM3

Dosage, Equipment, Insecticides, Spraying, Toxins.

INDUSTRY

ECONOMICS

572-69

MOLDED FROM WOOD FIBERS, NEW FAM-
ILY OF PRODUCTS FOR VARIETY OF MAR-
KETS.

P E Caron

Wood Wood Prod 74(9):24-26,44

Sep 1968 99.82 W856

Economics, Furniture, Industry, Marketing, Resins.

573-69

APPARENT SAP VELOCITIES IN BIG
SAGEBRUSH AS RELATED TO NEARBY EN-
VIRONMENT.

G F Gifford

J Range Manage 21(4):266-268

Jul 1968 60.18 J82

Artemisia, Environment, Physiology, Research,
Sap, Velocity, Weed control.

574-69

FARMERS' EXPENDITURES FOR CUSTOM
PESTICIDE SERVICE IN 1964.

R Jenkins T Eichers P Andrilenas A Fox

USDA Agr Econ Rep (146):24P MAP

Oct 1968 A281.9 AG8A

Economics, Fertilizer application, Herbicides,
Methodology, Pesticide application, Surveys, Ta-
bles (data).

575-69

RECIPE FOR MODERN HANDLING.

B A Marvin

Cranberries 7-10

Nov 1968 80 C852

Cranberries, Equipment, Industrial management,
Marketing research.

576-69

THE 'LOCAL ANGLE'.

J L Taylor

Ext Serv Rev 39(7):3

21 Jul 1968 1 EX892EX

INDUSTRY

577-69

Agricultural administration, Agricultural outlook, Crop yields, Equipment, Farming methods, Rural development.

EDUCATION

577-69

PEST CONTROL, EDUCATION, AND THE NEW BREED.

R J Pence

Pest Contr Oper News 27(8):12-13

BIBLIOGRAPHY

Aug 1967 SB951.A1P4

Education, Management, Nomenclature, Pest control, Pesticide application, Pesticides.

REGULATIONS

578-69

FEDERAL REGISTRATION REQUIREMENTS FOR PESTICIDE PRODUCTS.

H G Alford

Northwest Crop Produc Conf Rep 1967

MEETING:3-6

1967 464.9 N813

Agricultural regulation, Pesticides.

579-69

CROP AND LIVESTOCK DEPREDAATION REDUCED BY WILDLIFE SERVICES DAMAGE CONTROL PROGRAMS.

Anonymous

Calif Cattleman 51(10):25

Nov 1968 43.8 C12

Crop losses, Field crops, Livestock, Livestock diseases, Orchards, Poultry, Predatory animals.

SUBJECT INDEX

ABDOMEN Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies.	4
ABORTION Studies on vibronic infection of sheep and carion crows.	450
ABSORPTION Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats.	427
Effects of gibberellin on photosynthesis in red clover (<i>Trifolium pratense</i> L.).	542
ABSORPTION (BIOLOGICAL) The effect of mucin on the amino acid absorption in the rat intestine.	203
ABSORPTION SPECTRA Integumental pigments of the millipede, <i>Polydesmus angustus</i> (Latzel).	133
ACARICIDES The effective breadth and action of temik. (Experiences from Germany).	135
Ethion a new acaricide for control of red spider, scarlet, pink and purple mites.	284
ACCIDENT PREVENTION Controlling the Mexican bean beetle.	56
Rat poison and insecticide.	329
Household insecticides.	503
Safe use of pesticides.	506
ACERIA SHELTONI Old and new Acaridae, citrus plant parasites in Italy.	274
ACHAEA JANATA A note on the control of the semi-cooper, <i>Achaea Janata</i> L., on castor.	291
ACHYRANTHES Synthesis of rubrosterone, a metabolite of insect-moulting substances from <i>Achyranthes rubrofusca</i> .	102
ACRIDIDAE Feeding behavior and nutrition in grasshoppers and locusts.	75
From grasshopper to a locust.	141
ACTINOBACILLOSIS On the occurrence and treatment of actinobacillosis in cattle.	235
ADELINA TRIBOLII Infectiousness of coccidians for insects.	174
ADSORPTION Effect of atrazine on oats (<i>Avena sativa</i> var. Minhafer) I and II. (abstract).	490
Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination.	565
AEDS AEGYPTI Vitamin A deficiency: Effect on mosquito eye ultrastructure.	65
Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin.	187
AEDS DETRITUS Pre-gravid phase of ovarian development in <i>Aedes detritus</i> Haliday.	151
AERIAL SPRAYING The gypsy moth threat in America.	216
Methods concerning the determination of the effectiveness of insecticides against the European corn borer (<i>Ostrinia</i> (<i>Pyrausta</i>) <i>nubilalis</i> Hbn.) with small control tests and aerial chemical applications.	227
Phytophthora leaf fall and pod rot.	252
AFLATOXIN Fluorodensitometric measurement of aflatoxin thin layer chromatograms.	451
Survey of green coffee for potential aflatoxin contamination.	456
Analysis for aflatoxin M in milk.	458
Solid state fluorescence emission of aflatoxins on silica gel.	460
Note on analysis of aflatoxins in green coffee.	462
Note on aflatoxin M ₁ : Optical and X-ray crystallographic data.	560
AFRICA A new sub-species of <i>Cynandra opis</i> Drury.	34
AGALACTIA Swine mastitis-metritis agalactia syndrome.	369
AGAPETES INES Some interesting <i>Rhopalocera</i> of Eastern Spain.	13
AGAPETES SYLLIUS Some interesting <i>Rhopalocera</i> of Eastern Spain.	13
AGAR Bacterial stripe blight of oats caused by <i>Pseudomonas striafaciens</i> (Elliott) Starr et Burkholder.	260
The culture of <i>Phytophthora infestans</i> on fully synthetic culture medium substrata.	525
AGGLUTINATION TEST The use of <i>Brucella</i> whey complement fixation test in a herd outbreak.	408
AGING The Hessian fly.	281
Scrub tick paralysis in farm animals.	333
AGLAIS URTICAE A deviant form of <i>Aglais urticae</i> . (<i>Nymphalidae</i>).	33
AGRICULTURAL ADMINISTRATION The 'Local Angle'.	576
AGRICULTURAL CHEMISTRY Findings concerning nourishment and toxic residues in plants, other health hazards and life threats.	478
AGRICULTURAL ECONOMICS Plant protection and the economical position of farming.	195
Sampling pests and diseases of tea: III.	208
Is ergot infection unimportant.	220
AGRICULTURAL HISTORY Forty years of pest control work.	210
AGRICULTURAL INDUSTRIES Breast blisters in turkeys.	402
AGRICULTURAL OUTLOOK The 'Local Angle'.	576
AGRICULTURAL PRODUCTIVITY How to produce high yields.	194
AGRICULTURAL PRODUCTS How fungi infect stored grains.	261
Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,O-diethyl S-2-(ethylthio) ethyl phosphorodithioate.	479
Establishment of tolerances for pesticide residues.	493
AGRICULTURAL REGULATION Cholera eradication progress report.	374
Card brucellosis test... swine.	382
Official FDA tolerances.	482
Federal registration requirements for pesticide products.	578
AGRICULTURAL RESEARCH Germination biology and the fight against the chickenmillet.	331
AGRICULTURE Agricultural control measures against intestinal parasites in cattle.	446
Effect of agriculture on nitrate pollution of groundwater.	469
The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view.	509
AGROBACTERIUM TUMEFACIENS The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves.	527
AGRONOMY 68th annual report of the Bureau of Sugar Experiment Stations.	191
AGROPYRON Control of Dalmatian toadflax.	320
Effects of 2,4-D on emergence and seedling growth of range grasses.	510
AIR POLLUTION Look what's happening to insect control.	94
Tonsillar carcinoma in rural dogs.	405
Pollution costs money.	465
Defense possibilities of society against pollution of food and environment.	466
AIR SACULITIS Airsacculitis relation to mycoplasmas in turkeys free of <i>Mycoplasma gallisepticum</i> .	360
ALCOHOLIC BEVERAGES Permissive chemical.	568
ALDRIN The situation regarding the use of aldrin and dieldrin in Europe.	504
Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract).	512

SUBJECT INDEX

ALFALFA

ALFALFA

A comparison of post-emergence herbicides in young lucerne.

324

Parathion residue in cured alfalfa.

495

ALKALOIDS

On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homoglomerin, alkaloids from arthropods.

149

ALPHA GLOBULINS

Blood chemical and cellular changes in canine dirofilariasis.

420

ALSIKE CLOVER

Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops.

541

AMETRYNE

The chemical control of weeds in pineapple plantations.

319

AMINO ACIDS

The excretion of nitrogen in insects.

69

Amino acid and protein metabolism in insect development.

73

The biochemistry of the insect fat body.

110

The effect of mucin on the amino acid absorption in the rat intestine.

203

Effect of different patterns of excess amino acids on performance of chicks fed amino acid-deficient diets.

424

Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein.

536

AMITROLE

New weed killers boost orchard conservation.

304

Tree line weed control in Goulburn Valley orchards.

325

AMMONIA

The excretion of nitrogen in insects.

69

AMOEBIA

Quinoline derivatives: Part XIX. Potential amoebicidal agents.

551

AMPICILLIN

Diagnosis and treatment of chronic Salmonella typhimurium infection in sows.

443

ANAGALLIS ARVENSIS

A note on the isolation and chemical characteristics of antifungal agents from extracts of Anagallis arvensis L.

239

ANAGASTA KUEHNIELLA

Environmental humidity and the susceptibility of larvae of Anagasta kuehniella Zell. to Bacillus thuringiensis Berliner.

91

A contribution to the study of the mode of action of Bacillus thuringiensis Berliner in regard to the flour moth Anagasta (Ephestia) kuehniella Zeller (Lepidoptera).

177

ANAPLASMOSIS

Tick-borne diseases of cattle in Trinidad.

438

ANEMIA

A filterable, proliferating factor simulating autoimmunity in malarious and nonmalarious ducklings.

392

ANIMAL ABNORMALITIES

Equine ovarian granulosa tumours.

372

ANIMAL BREEDING

Disease prevention.

330

ANIMAL DISEASES

Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR.

343

Feline panleucopenia - a serological study.

356

Endotoxin properties of Leptospira canicola.

359

Acute and chronic erysipelas rhusiopathiae infection in rats: Histopathological examination.

362

A selective-differential medium for detection of Streptococcus agalactiae.

367

Swine mastitis-metritis agalactia syndrome.

369

Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus.

375

Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis.

393

Heredity and disease in domestic animals.

394

Studies on prevention of mink-distemper.

401

Tonsillar carcinoma in rural dogs.

405

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis.

406

Prevention, diagnosis and treatment of disease.

409

A new type in experimental intraperitoneal infection of staphylococci in mice.

414

Comparative study of the pathogenic and immunogenic power of a new acapsulogenic strain of Bacillus anthracis (Ihtiman strain).

418

The history of investigation of tumors in animals.

430

Diagnostic station near Dunedin is New Zealand's watchdog against disease.

441

ANIMAL GENETICS

Heredity and disease in domestic animals.

394

ANIMAL HISTOLOGY

Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment.

351

Acute and chronic erysipelas rhusiopathiae infection in rats: Histopathological examination.

362

An outbreak of rabies in swine.

413

ANIMAL NUTRITION

The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding.

342

Neural lesions in the offspring of female rats fed a copperdeficient diet.

349

Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig.

370

Nutrient requirements of poultry.

397

Nutrient requirements of dairy cattle.

398

Nutrient requirements of horses.

399

Effect of different patterns of excess amino acids on performance of chicks fed amino acid-deficient diets.

424

ANIMAL PHYSIOLOGY

Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue.

337

Control by ovarian status of induced leukocytic responses in the sheep uterus.

346

Evaluation of Brucella abortus strain 45/20 bacterins prepared with various adjuvants.

347

Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract).

353

Nutrient requirements of horses.

399

Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats.

427

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444.

442

Gains from worm drenching ewe hoggets in South Canterbury.

445

ANIMAL VECTORS

Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967.

339

Anti-rabies vaccinations at the Montpellier Center in 1967.

383

Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967.

384

Anti-rabies vaccinations at the Pasteur Institute in 1967.

387

Anti-rabies vaccinations at the Marseille Pasteur Center in 1967.

417

Isolation of rabies virus from fruit bats in Thailand.

419

ANIMALS

Defoliation in Vietnam.

214

Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement.

338

Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation.

423

ANTELOPES

The effect of feeding the tsetse fly Glossina morsitans Westw. on impala blood.

113

ANTESTIOPSIS

Supplementary notes on the orbitalis (Westw.) group of Antestiopsis (Hemiptera, Pentatomidae).

26

ANTHELMINTICS

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444.

442

Anthelmintic effect of salicylanilide preparation on common liver flukes.

449

ANTHORES LEUCONOTUS

Pest profiles III. - White borer.

271

ANTHRANILIC ACID

On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homoglomerin, alkaloids from arthropods.

149

ANTIBIOTICS

- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145
- Two sides to the vaccine picture. 345
- Drugs: How do you use them. 350
- Swine mastitis-metritis agalactia syndrome. 369
- Oryzoxymycin, a new antibiotic. 371
- Nutrient requirements of dairy cattle. 398
- Effectiveness of antibacterials infused into the proximal colon on the pig. 426
- Drugs - their use and abuse. 501
- On the antibiotically active substances of the tulip (*Tulipa gesneriana*). 543
- Collaborative study of microbiological assay of oxytetracycline in feeds. 545
- Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555
- Separation of penicillins by paper and thin layer chromatography. 558

ANTIBODIES

- Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*. 340
- Feline panleucopenia- a serological study. 356
- A serological inquiry about brucellosis in Toulouse veterinary students. 363
- The use of *Brucella* whey complement fixation test in a herd outbreak. 408
- Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429

ANTIGENS

- Lanjan virus, a new agent isolated from *Dermaecentor auratus* in Malaya. 437

ANTIRRHINUM

- Redistribution of ⁴⁵Ca in *Trifolium subterraneum* L and *Antirrhinum majus* L. 243

ANTIRRHINUM MAJUS

- Directional growth of the urediospore germ tubes and stomatal penetration. 242

ANTISEPTICS

- Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
- Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn). 264
- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509

APAMEA PABULATRICULA

- Apamea pabulatricula* Brahm in Belgium. (Noctuidae). 36

APANTELES PALUDICOLAE

- Note on *Sphenarehes anisodaetylus*, Wkr. damaging bottle gourd (*Lagenaria leucantha*, Rusby). 285

APHELENCHOIDES

- Aphelenchoides bicaudatus*, a parasite of cultivated mushroom. 299

APHIDIDAE

- Notes on some aphids from Vietnam, with description of a new species (Homoptera, Aphidodea). 51
- The control of polymorphism in aphids. 115
- A model of the plant-to-plant movement of aphids. I. Description of the model. 153
- Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-eurling aphids in Czechoslovakia with notes on the diapause (Hym. Aphidiidae). 160
- Spruce galls in Wisconsin. 241

APHIS BERLINSKII

- A new genus and four new species of Aphids (Homoptera, Aphididae) from Poland. 103

APHIS FABAE

- The effects of insecticides on the interrelationship between *Aphis fabae* Scop. and some of its epiphytes. 157

APHIS TACITA

- A new genus and four new species of Aphids (Homoptera, Aphididae) from Poland. 103

APICULTURE

- Some impacts of beekeeping on the management of the Miombo in Tanzania. 213

APIS MELLIFERA

- The measurement and interrelationships of infections with *Nosema apis* and *Malipighamoeba mellificae* of honey-bee populations. 59
- Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89
- The fate of spores of *Nosema apis* Zander ingested by muscoid flies. 111
- Side effects of *Bacillus thuringiensis*. The effects on bees (*Apis mellifera* L.). 112
- The occurrence of a *Crithidia* species within the gut of the honey bee, *Apis mellifica* L. 121

APPLES

- The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
- Fireblight: A disease we don't want. 230
- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocybidae) grown on apple trees. 268
- Research yields easily applied virus deadly to codling moth larvae. 276
- What happens when sprays are no longer needed for control of codling moth. 282
- Effect of warming cycles during storage on the behavior of Jonathan and Granny Smith apples in cool storages. 454
- Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486

AQUATIC ANIMALS

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton. 336

AQUATIC INSECTS

- Osmotic and ionic regulation in insects. 152

AQUATIC PLANTS

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton. 204

AQUATIC WEEDS

- Chemical control of weeds in fields and in the open country. 302
- Aquatic weed control. 307

ARCTIIDAE

- An interesting specimen: *Celama centonalis* f. *littoralis* Paux. (Aretiidae Nolinae). 52

ARGININE

- Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536

ARSENIC

- The toxicity of fly ash for cattle. 507

ARSENIC COMPOUNDS

- Determination of arsenic in organic arsonates. 474

ARTEMISIA

- Sagebrush reinvasion as affected by some environmental influences. 312
- Apparent sap velocities in big sagebrush as related to nearby environment. 573

ARTERITIS

- Acute and chronic erysipelotheix *rhusiopathiae* infection in rats: Histopathological examination. 362

ARTHRITIS

- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344

ARTHROPODA

- Image formation and sensory transmission in the compound eye. 70
- On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homglomerin, alkaloids from arthropods. 149
- Problems of public health and medical entomology. 186
- Studies on the epidemiology of vesicular stomatitis virus. 376

ARTIFICIAL INSEMINATION

- Preliminary study of an enterovirus isolated from a balanoposthite lesion of cattle. 357

ASPERGILLOSIS

- Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis. 355

ASPERGILLUS FLAVUS

- How fungi infect stored grains. 261

ASPIDIOTUS PERNICIOSUS

- Can one reconcile the control of San Jose scale (*Aspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.). 125

ASSAY

- The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95

ATHERIGONA

- The effect of mucin on the amino acid absorption in the rat intestine. 203
- Concentration of certain myxoviruses with polyethylene glycol. 378
- Determination of arsenic in organic arsonates. 474
- Guide to the analysis of pesticide residues. 546
- The outer layer of the cell envelope of *Halobacterium halobium*. 564

ATHERIGONA

- A new Japanese species of *Atherigona* Rond. (Diptera: Muscidae) reared from sugar-cane. 44

ATMOSPHERE

- Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523

ATRAZINE

- Atrazine in oil in South Dakota. 323
- Effect of atrazine on oats (*Avena sativa* var. Min-hafer) I and II. (abstract). 490
- Improved GLC method for s-triazine residue determination. 498
- Influence of some aminotriazine herbicides on some soil fungi. 537

AULACORTHUM SOLANI

- Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu latiore (Hemipt. Aphid.). 127

AUSTROLIMNIUS

- The subgenera of *Austrolimnius* (Coleoptera: Elmithidae). 31

AUTOPSIES

- Erysipelas--our costliest pig disease. 352
- The practice of the present diagnostic of rabies. 377

AUTORADIOGRAPHY

- Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis. 391

AVENA FATUA

- Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313

AVIAN LYMPHOMATOSIS

- Studies on acute Marek's disease. VI. Body temperature of infected chickens. 354
- Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate. 412

BACCHARIS PILULARIS

- Invasion of grassland by *Baccharis pilularis* DC. 314

BACILLUS ANTHRACIS

- Comparative study of the pathogenic and immunogenic power of a new acapsulogenic strain of *Bacillus anthracis* (Ihtiman strain). 418

BACILLUS CEREUS

- The role of the intestinal microflora of insects in the disease development brought about by *Bacillus cereus* var. *galleriae*. 108

BACILLUS POPILLIAE

- The present status of milky disease of Japanese beetle in Connecticut. 62
- Cytology of milky disease bacteria. II. Morphogenesis of *Bacillus popilliae* in vitro. 63

- Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64

BACILLUS SUBTILIS

- Cytochrome c and evolution. 434

BACILLUS THURINGIENSIS

- The biochemistry and mode of action of *Bacillus thuringiensis* Berliner and its varieties. 58

- The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67

- Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68

- Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests. 72

- A study proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 77

- Environmental humidity and the susceptibility of larvae of *Anagasta kuehniella* Zell. to *Bacillus thuringiensis* Berliner. 91

- Tests on standardization of *Bacillus thuringiensis* preparations. 100

- Effects of temperature and water on viability and virulence of *Bacillus thuringiensis* var. *thuringiensis* Berliner spores. 106

- Side effects of *Bacillus thuringiensis*. The effects on bees (*Apis mellifera* L.). 112

- Comparative study of the enzymatic hydrolysis of the crystals of the strains of *Bacillus thuringiensis* serotype I Berliner and serotype II Anduze. 114

- Some thoughts on the taxonomy of *Bacillus thuringiensis* Berliner. 124

- Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (Laspeyresia) *pomonella* L.). 142

- Considerations on the toxic and labile substance produced by *Bacillus thuringiensis* var. *thuringiensis* Berliner (labile exotoxin). 154

- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175

- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephestia*) *kuehniella* Zeller (Lepidoptera). 177

BACTERIA

- Cytology of milky disease bacteria. II. Morphogenesis of *Bacillus popilliae* in vitro. 63

- Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64

- A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L. 107

- The role of the intestinal microflora of insects in the disease development brought about by *Bacillus cereus* var. *galleriae*. 108

- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephestia*) *kuehniella* Zeller (Lepidoptera). 177

- Current literature XIX: An annotated bibliography. 201

- Research note: Observations on immune factors associated with arizona group infections in turkeys. 364

- Breast blisters in turkeys. 402

- Mastitis prevention and control. 416

- Effectiveness of antibacterials infused into the proximal colon on the pig. 426

- The outer layer of the cell envelope of *Halobacterium halobium*. 564

BACTERIAL DISEASES (ANIMALS)

- On the occurrence and treatment of actinobacillosis in cattle. 235

- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344

- Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants. 347

BACTERIAL DISEASES (BIRDS)

- Breast blisters in turkeys. 402

BACTERIAL DISEASES (INSECTS)

- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145

BACTERIAL DISEASES (PLANTS)

- Pests are endangering our cultivated plants. 211

- Variation in the host-parasite relationship of a crop disease. 218

- Fireblight: A disease we don't want. 230

- Oat diseases and their control. 256

- Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260

BACTERIAL VACCINES

- Diagnosis and treatment of chronic *Salmonella typhimurium* infection in sows. 443

BACTERICIDES

- The use of micro-organisms for the control of insect pests. 136

- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509

- Mono-ethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and mono-ethers. Patent 3,408,402. 547

BACTERINS

- Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants. 347

BACTERIOPHAGES

- Genetic study of a mutation modifying the sensitivity of a lambda phage to immunity. 184

BAITS

- Rat poison and insecticide. 329

BALANCE OF NATURE

- Look what's happening to insect control. 94

BALANOPOSTHITIS

- Preliminary study of an enterovirus isolated from a balanoposthite lesion of cattle. 357

BANANAS

- The status of some micronutrients in healthy Robusta banana plants. 544

SUBJECT INDEX

BIOLOGICAL CONTROL (INSECTS)

- BARLEY**
 A model of the plant-to-plant movement of aphids. I. Description of the model. 153
 Status of seed treatment for barley smut control. 240
 The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.). 288
 Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
 New developments in hybrid barley research. 520
 Effect of gibberellic acid on gamma irradiated barley seeds. 531
 Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
 Peroxidase isozymes in barley leaves from irradiated seeds. 554
- BATS**
 Isolation of rabies virus from fruit bats in Thailand. 419
- BAYER 41831**
 Potentiation of toxicology of sumithion by phosphamidon in the rat. (abstract). 505
- BEANS**
 The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
- BEARS**
 A massive invasion of *Stilpnolia salicis*. (Lymantriidae). 46
- BEAUVERIA BASSIANA**
 The defense mechanism of the cuticle of the sunn pest (*Eurygaster integriceps* Put.) against plant microorganisms. 83
 The use of micro-organisms for the control of insect pests. 136
- BEES**
 Some impacts of beekeeping on the management of the Miombo in Tanzania. 213
- BEHAVIORISM**
 Dieldrin effects in two generations of penned hen pheasants. 502
- BENEFICIAL INSECTS**
 Trichogrammatidae—the smallest winged insects. 42
 The need for conserving natural enemies of pests. 270
- BENZENE HEXACHLORIDE**
 A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
 Pesticide residues in ointment bases of natural origin. 496
 The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562
- BIBLIOGRAPHY**
 Bibliography on the systematics of entomophagus insects VI. 19
 Bibliography of biological control, V. 87
 Bibliography of biological control, VI. 88
- Current literature XIX: An annotated bibliography. 201
 Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406
- BIOCHEMISTRY**
 The biochemistry and mode of action of *Bacillus thuringiensis* Berliner and its varieties. 58
 Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68
 A study proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 77
 Metabolic control mechanisms in insects. 98
 Synthesis of rubrosterone, a metabolite of insect-moulting substances from *Achyranthes rubrofusca*. 102
 The biochemistry of the insect fat body. 110
 The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130
 Integumental pigments of the millipede, *Polydesmus angustus* (Latzel). 133
 On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homoglomerin, alkaloids from arthropods. 149
 The effects of insecticides on the interrelationship between *Aphis fabae* Scop. and some of its epistites. 157
 A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159
 Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
 The biochemistry of sugars and polysaccharides in insects. 176
 The effect of mucin on the amino acid absorption in the rat intestine. 203
 The influence of herbicides on the incidence of disease with particular reference to temperate fruit crops. 238
 Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249
 Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260
 Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch). 267
 The increased attack of *Ditylenchus dipsaci* on onion caused by some fungicides. 297
 The state of weeds when applying herbicides and insecticides in corn fields. 318
 Urinary conversion products of injected progesterone-4-14-C in the domestic fowl. 332
 Some effects of route of administration and dilution on the toxicity of carbon tetrachloride drenches for sheep. 361
 Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation. 423
- Cytochrome c and evolution. 434
 Drugs - their use and abuse. 501
 The toxicity of fly ash for cattle. 507
 Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
 Translocation of systemic fungicides. 519
 Inhibition of photosynthetic electron transport by ioxynil. 521
 Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524
 The culture of *Phytophthora infestans* on fully synthetic culture medium substrata. 525
 The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
 GA increases tangelo yields. 530
 Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534
 Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
 Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth. 540
 The outer layer of the cell envelope of *Halobacterium halobium*. 564
- BIOLOGICAL ASSAY**
 Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68
 Tests on standardization of *Bacillus thuringiensis* preparations. 100
 Application of stresses to foot-and-mouth disease virus. 358
 Collaborative study of microbiological assay of oxytetracycline in feeds. 545
- BIOLOGICAL CONTROL (INSECTS)**
 The biochemistry and mode of action of *Bacillus thuringiensis* Berliner and its varieties. 58
 International colloquium on insect pathology and microbiological control. 74
 Bibliography of biological control, V. 87
 Bibliography of biological control, VI. 88
 Environmental humidity and the susceptibility of larvae of *Anagasta kuhniella* Zell. to *Bacillus thuringiensis* Berliner. 91
 Look what's happening to insect control. 94
 The role of the intestinal microflora of insects in the disease development brought about by *Bac. cercus* var. *galleriac*. 108
 Fly enemies...your allies. 117
 The use of micro-organisms for the control of insect pests. 136
 Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia pomonella* L.). 142

SUBJECT INDEX

BIOLOGICAL CONTROL (PESTS)

- A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159
- Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae). 160
- Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* (L.)) by means of egg parasites of the genus *Trichogramma*. 161
- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175
- The gypsy moth threat in America. 216
- The need for conserving natural enemies of pests. 270
- Research yields easily applied virus deadly to codling moth larvae. 276
- What happens when sprays are no longer needed for control of codling moth. 282
- BIOLOGICAL CONTROL (PESTS)**
- Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests. 72
- General aspects of bacteriological control. 99
- New facts concerning the extrusion of microsporidian spores. 122
- Insect mycology: Glimpses and perspectives. 131
- Observations and studies on extomophagous fungi in Hungary. 165
- Pests are endangering our cultivated plants. 211
- The factors determining the efficacy of biological preparations in plant protection. 229
- BIOLOGICAL CONTROL (PLANT DISEASES)**
- Plant inspection and what it entails. 258
- BIOLOGICAL CONTROL (WEEDS)**
- We Squashed the weeds. 326
- BIOLOGICAL PRODUCTS**
- The factors determining the efficacy of biological preparations in plant protection. 229
- BIOLOGY**
- An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae. 286
- Eelworm in tea: Some important groups. 296
- Weed biology - A future. 321
- Germination biology and the fight against the chickenmillet. 331
- BIOSYNTHESIS**
- Lipid metabolism and function in insects. 92
- The biochemistry of sugars and polysaccharides in insects. 176
- BIRDS**
- Descriptions of new and little known species of Mallophaga (Insecta) from maritime hosts of Chile, South America. 18
- Two sides to the vaccine picture. 345

- Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue. 453
- A consideration of insecticide effects on hypothetical avian populations. 499
- BLASTICIDIN S**
- Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus. 279
- BLIGHT**
- Container growing. Chapter 22: Insects and diseases. 206
- Variation in the host-parasite relationship of a crop disease. 218
- BLOOD**
- The effect of feeding the tsetse fly *Glossina morsitans* Westw. on impala blood. 113
- Pre-gravid phase of ovarian development in *Aedes detritus* haliday. 151
- Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351
- BLOOD CHEMISTRY**
- Blood chemical and cellular changes in canine dirofilariasis. 420
- BLOOD COMPOSITION**
- Blood chemical and cellular changes in canine dirofilariasis. 420
- BLOOD PARASITES**
- Tick fever in poultry. 415
- BLOOD PLASMA**
- Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337
- BLOOD SERUM**
- On the occurrence and treatment of actinobacillosis in cattle. 235
- Characterization of agglutinins of cattle serum against *Brucella abortus*. 411
- BLOOD TESTS**
- Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393
- Get rid of grubs in a hurry. 435
- BLUE STAIN (CONIFERAE)**
- Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of *Pings caribaea* in trinidad. 207
- BLUETONGUE**
- Experimental bluetongue disease in white-tailed deer. 431
- BLUETONGUE VIRUS**
- Epizootiology of bluetongue. Abstract. 390
- Experimental bluetongue disease in white-tailed deer. Abstract. 428
- BOMBYX MORI**
- A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L. 107
- The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130
- The use of micro-organisms for the control of insect pests. 136

- Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
- Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nucleopolyhedrosis virus. 171
- Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus. 182
- BOREIDAE**
- Preliminary report on the distribution in Switzerland of *Boreus hiemalis* L. and *Boreus westwoodi* Hag (Mecoptera, Boreidae). 23
- BOREUS HIEMALIS**
- Preliminary report on the distribution in Switzerland of *Boreus hiemalis* L. and *Boreus westwoodi* Hag (Mecoptera, Boreidae). 23
- BOREUS WESTWOODI**
- Preliminary report on the distribution in Switzerland of *Boreus hiemalis* L. and *Boreus westwoodi* Hag (Mecoptera, Boreidae). 23
- BORON**
- The boron status of deciduous fruit as reflected by leaf and fruit composition. 221
- Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522
- The status of some micronutrients in healthy Robusta banana plants. 544
- BORRELIA ANSERINA**
- Tick fever in poultry. 415
- BRACON GREENI**
- Effect of superparasitism on the development, sex ratio and progeny of *Bracon greeni* Ashmead. 139
- BRAIN**
- Isolation of rabies virus from fruit bats in Thailand. 419
- BRASSICA ARVENSIS**
- Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
- BREEDING**
- Fly enemies...your allies. 117
- Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus. 182
- Protection against virus diseases, an essential aspect of maintenance breeding in fruit growing in Czechoslovakia. 223
- The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding. 342
- Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate. 412
- A consideration of insecticide effects on hypothetical avian populations. 499
- BREVICORYNE BRASSICAE**
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- BREVIPALPUS**
- Old and new Acaridae, citrus plant parasites in Italy. 274

SUBJECT INDEX

CECIDOSTIBA

- BROADBEANS**
Inhibition of photosynthetic electron transport by ioxynil. 521
- BROMUS**
Effects of 2,4-D on emergence and seedling growth of range grasses. 510
- BRUCELLA ABORTUS**
Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants. 347
The use of *Brucella* whey complement fixation test in a herd outbreak. 408
Characterization of agglutinins of cattle serum against *Brucella abortus*. 411
- BRUCELLA OVIS**
Brucella ovis infection. 373
- BRUCELLOSIS**
A serological inquiry about brucellosis in Toulouse veterinary students. 363
The eradication of bovine tuberculosis and brucellosis. 368
Card brucellosis test... swine. 382
- BUFFALOS**
Resistance capacity of ticks against starvation under laboratory conditions. 140
- CAENACIS**
Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species. 6
- CALCIUM ISOTOPES**
Redistribution of ⁴⁵Ca in *Trifolium subterraneum* L. and *Antirrhinum majus* L. 243
- CALLIPHORA VICINA**
The fate of spores of *Nosema apis* Zander ingested by muscoid flies. 111
- CALLOSE**
The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292
- CALVES**
Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*. 340
- CANCER**
The history of investigation of tumors in animals. 430
- CANINE DISTEMPER**
Studies on prevention of mink-distemper. 401
- CANTALOUPE**
Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263
We Squashed the weeds. 326
- CARABIDAE**
Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79
- CARBAMATES**
Metabolism of methylcarbamate insecticides by the NADPH₂-requiring enzyme system from houseflies. 4
The effective breadth and action of temik. (Experiences from Germany). 135
Factors influencing the selectivity of herbicides. 500
- Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512
- CARBARYL**
Controlling the Mexican bean beetle. 56
Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79
The gypsy moth threat in America. 216
A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
Rapid cleanup for carbaryl, using channel layer chromatography. 476
Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486
- CARBOHYDRATES**
The biochemistry of the insect fat body. 110
The biochemistry of sugars and polysaccharides in insects. 176
- CARBON**
Influence of some aminotriazine herbicides on some soil fungi. 537
- CARBON DIOXIDE**
The effect of bioclimate on the communication system of night-flying moths. 170
Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523
- CARBON ISOTOPES**
Structure of cyasterone, a novel C₂₉ insect-moulting substance from *Cyathula capitata*. 163
Urinary conversion products of injected progesterone-4-14-C in the domestic fowl. 332
Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536
- CARBON TETRACHLORIDE**
Some effects of route of administration and dilution on the toxicity of carbon tetrachloride drenches for sheep. 361
- CARBOPHENOTHION**
A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
- CARCINOMA**
Tonsillar carcinoma in rural dogs. 405
- CAROTENOID**
Carotenoid compounds. Patent 3,408,406. 552
- CARPOCAPSA**
Can one reconcile the control of San Jose scale (*Quadraspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.). 125
- CARPOCAPSA POMONELLA**
Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.). 86
Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia pomonella* L.). 142
Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* (L.)) by means of egg parasites of the genus *Trichogramma*. 161
- Research yields easily applied virus deadly to codling moth larvae. 276
What happens when sprays are no longer needed for control of codling moth. 282
- CASTANEA**
Growth of planted chestnut trees (*Castanea crenata*) in relation to soil nutrients in Korea. 528
- CASTORBEANS**
A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
- CATS**
Feline panleucopenia-a serological study. 356
- CATTLE**
Resistance capacity of ticks against starvation under laboratory conditions. 140
On the occurrence and treatment of actinobacillosis in cattle. 235
Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337
The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding. 342
Drugs: How do you use them. 350
The eradication of bovine tuberculosis and brucellosis. 368
Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406
The use of *Brucella* whey complement fixation test in a herd outbreak. 408
Characterization of agglutinins of cattle serum against *Brucella abortus*. 411
Mastitis prevention and control. 416
Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429
Pinkeye in cattle. 432
Cytochrome c and evolution. 434
Tick-borne diseases of cattle in Trinidad. 438
Agricultural control measures against intestinal parasites in cattle. 446
The life span of *Fasciola hepatica* in cattle. 448
The toxicity of fly ash for cattle. 507
Suspected sodium fluoroacetate poisoning in sheep and cattle. 511
- CECIDOMYIIDAE**
Biological observations on *Rhabdophaga ramicola* Rubs. 40
A new species of gall gnat *Mamaevia* n.g.n.sp. (Diptera, Itonididae) from Bohemia. 48
- CECIDOSTIBA**
Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species. 6

SUBJECT INDEX

CELAMA CENTONALIS LITTORALIS

CELAMA CENTONALIS LITTORALIS

An interesting specimen: *Celama centonalis* f. *littoralis* Paux. (Arctiidae Nolinae).

52

CELERY

Reduction of parathion residue on celery.

497

CELL DIVISION

Concerning some aspects of tissue nourishing gall mites.

129

CELL WALL

The outer layer of the cell envelope of *Halobacterium halobium*.

564

CELLS

Vitamin A deficiency: Effect on mosquito eye ultrastructure.

65

A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L.

107

The development of the scrota in male embryos of the mealy bug, *Pseudococcus obscurus* Essig.

181

Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus.

385

Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage.

526

Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth.

540

The outer layer of the cell envelope of *Halobacterium halobium*.

564

CERAMBYCIDAE

On the genus *Dejanira* Thomson (Col. Cerambycidae Cerambycinae).

53

CERATITIS CAPITATA

Marking insects with dietary manganese for detection by neutron activation.

41

A fruit pest is being sterilized.

272

CERATOMIA CATALPAE

Resistance to cold in *Ceratonia catalpa*.

1

CERCOSPORA BETICOLA

A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.).

159

CESTODA

Diagnostic station near Dunedin is New Zealand's watchdog against disease.

441

CHALCIDOIDEA

Trichogrammatidae—the smallest winged insects.

42

CHEMICAL ANALYSIS

The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography.

562

CHEMICAL CONTROL (ANIMAL DISEASES)

On the occurrence and treatment of actinobacillosis in cattle.

235

Swine mastitis-metritis agalactia syndrome.

369

Notice of filing of petition for food additives decoquinat and procaine penicillin.

379

The inactivation effect of beta-propiolactone on the virus or the classical fowl plague.

404

Mastitis prevention and control.

416

CHEMICAL CONTROL (INSECTS)

Everglades station kills horn flies with dust.

3

Controlling the Mexican bean beetle.

56

Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442.

78

The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract).

95

The protection of dried sea-fish from infestation by *Dermestes frischii* Kug.

96

Can one reconcile the control of San Jose scale (*Quadraspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.).

125

The effective breadth and action of temik. (Experiences from Germany).

135

A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.).

159

Container growing. Chapter 22: Insects and diseases.

206

Special preparations recognized by the Statens forsogsvirksomhed i Plantekultur for control of plant diseases and pests.

212

The gypsy moth threat in America.

216

The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees.

269

Tests with insecticides for the control of resistant *Myzus persicae* (Sulzer) on year-round chrysanthemums.

277

Observations on the control of the coffee berry borer, *Hypothenemus hampei* (Ferr.), with endosulfan in Uganda.

280

Ethion a new acaricide for control of red spider, scarlet, pink and purple mites.

284

The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.).

288

A note on the control of the semi-cooper, *Achaea Janata* L., on castor.

291

Get rid of grubs in a hurry.

435

Dieldrin residue in an orchard-dairy area of Wisconsin.

481

Long-term movement of DDT applied to soil for termite control.

492

A consideration of insecticide effects on hypothetical avian populations.

499

CHEMICAL CONTROL (NEMATODES)

The effective breadth and action of temik. (Experiences from Germany).

135

Relative efficacy of different oil-cakes on the incidence of root-knot nematodes.

298

Nematodes of the Northern Great Plains.

300

Gains from worm drenching cwe hoggets in South Canterbury.

445

CHEMICAL CONTROL (PESTS)

Application of insecticides to paddy water for more effective rice pest control.

205

Pests are endangering our cultivated plants.

211

Methods concerning the determination of the effectiveness of insecticides against the European

312

corn borer (*Ostrinia* (*Pyrausta*) *nubilalis* Hbn.) with small control tests and aerial chemical applications.

227

Slugs cause damage in Ohio cornfields.

328

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444.

442

Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443.

444

Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments.

487

Parathion residue in cured alfalfa.

495

Household insecticides.

503

Monitoring the environment.

548

Quinoline derivatives: Part XIX. Potential amoebicidal agents.

551

CHEMICAL CONTROL (PLANT DISEASES)

Container growing. Chapter 22: Insects and diseases.

206

Special preparations recognized by the Statens forsogsvirksomhed i Plantekultur for control of plant diseases and pests.

212

Hindsight and foresight can control cotton seedling disease.

222

Verticillium wilt in the tomato cultures of the Valais.

231

Recommendations for chemical treatment of diseases of Hevea.

250

Problems of fungicidal efficiency.

255

Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder.

260

CHEMICAL CONTROL (WEEDS)

Chemical weed control.

301

Chemical control of weeds in fields and in the open country.

302

Use of petroleum oils and herbicide mixtures to improve weed control performance.

303

New weed killers boost orchard conservation.

304

Weed control in cereals.

305

Aquatic weed control.

307

A field trial with phenoxybutyric herbicides on tropical forage legumes.

308

A minimum cultivation trial with maize using paraquat herbicide.

309

Proposed program for accelerated weed control in Wyoming.

311

Sagebrush reinvasion as affected by some environmental influences.

312

Chemical control of pigweed. Patent 3,408,176.

315

Herbicides in Vietnam: AAAS board seeks field study.

316

- New possibilities of weed control in chicory (*Cichorium intybus*). 317
- The state of weeds when applying herbicides and insecticides in corn fields. 318
- The chemical control of weeds in pineapple plantations. 319
- Control of Dalmatian toadflax. 320
- Atrazine in oil in South Dakota. 323
- A comparison of post-emergence herbicides in young lucerne. 324
- Tree line weed control in Goulburn Valley orchards. 325
- A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii. 327
- Effects of 2,4-D on emergence and seedling growth of range grasses. 510
- CHEMICAL REACTIONS**
- Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533
- Colorimetric method for the determination of Dichlorovos (DDVP). 561
- Adsorption of malic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565
- CHEMICAL STRUCTURE**
- Gibberellin A23 in immature seeds of *Lupinus luteus*. 199
- CHEMICALS**
- Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263
- Chemical control of pigweed. Patent 3,408,176. 315
- Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444. 442
- Pesticides and perspective. 472
- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475
- Chemical aids figure in plant propagators' reports. 516
- Quinoline derivatives: Part XIX. Potential amoebicidal agents. 551
- Carotenoid compounds. Patent 3,408,406. 552
- Permissive chemical. 568
- CHEMISTRY**
- Fluorodensitometric measurement of aflatoxin thin layer chromatograms. 451
- Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue. 453
- Note on analysis of aflatoxins in green coffee. 462
- Rapid cleanup for carbaryl, using channel layer chromatography. 476
- Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography. 491
- Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage. 526
- Collaborative study of microbiological assay of oxytetracycline in feeds. 545
- Mono-ethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and monoethers. Patent 3,408,402. 547
- Carotenoid compounds. Patent 3,408,406. 552
- Process for preparing bis-(3,5,6-trichloro-2-hydroxyphenyl) methane. Patent 3,408,408. 553
- Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555
- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557
- Note on aflatoxin M₁: Optical and X-ray crystallographic data. 560
- Colorimetric method for the determination of Dichlorovos (DDVP). 561
- Collaborative study of gas chromatographic analysis of heptachlor content of formulations. 563
- The outer layer of the cell envelope of *Halobacterium halobium*. 564
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- O,o-diisopropyl-ethylsulfynylmethyl-dithiophosphate. Patent 3,408,426. 569
- CHEMOSTERILANTS**
- Look what's happening to insect control. 94
- CHICKENS**
- Germination biology and the fight against the chickenmillet. 331
- Studies on acute Marek's disease. VI. Body temperature of infected chickens. 354
- Endotoxin properties of *Leptospira canicola*. 359
- Notice of filing of petition for food additives decoquinat and procaine penicillin. 379
- Nutrient requirements of poultry. 397
- Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate. 412
- Effect of different patterns of excess amino acids on performance of chicks fed amino acid-deficient diets. 424
- The effects of various drugs on experimental chicken coccidiosis. 425
- Penetration patterns of *Mycoplasma gallisepticum* and Newcastle disease virus through the outer structures of chicken eggs. 433
- Retailing of barbecued chickens: A Canadian survey. 459
- Retailing of barbecued chickens: A survey in British Columbia. 463
- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
- CHICORY**
- New possibilities of weed control in chicory (*Cichorium intybus*). 317
- CHITIN**
- Chitin orientation in cuticle and its control. 134
- The chitin/protein complexes of insect cuticles. 144
- CHLORDANE**
- Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512
- CHLORINATED HYDROCARBONS**
- Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249
- Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat. 480
- Pesticide residues in ointment bases of natural origin. 496
- Dieldrin effects in two generations of penned hen pheasants. 502
- Monitoring the environment. 548
- CHLORINE**
- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512
- CHLORO-N-ISOPROPYLACETANILIDE, 2-**
- New possibilities of weed control in chicory (*Cichorium intybus*). 317
- CHLOROETHYL)TRIMETHYLAMMONIUM CHLORIDE, (2-**
- Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524
- CHLOROHYDRINS**
- Isolation and determination of chlorohydrins in foods fumigated with ethylene oxide or with propylene oxide. 489
- CHLOROPICRIN**
- Verticillium wilt in the tomato cultures of the Valais. 231
- CHLOROPLASTS**
- Inhibition of photosynthetic electron transport by ioxynil. 521
- CHLOROSIS**
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522
- CHOLINESTERASES**
- Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract). 353
- CHORIONIC GONADOTROPINS**
- Equine ovarian granulosa tumours. 372
- CHORISTONEURA MURINANA**
- Some experiences with the use of *Bacillus thuringiensis* Bcrl. against forest pests. 72
- CHROMATIN**
- Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation. 423

SUBJECT INDEX

CHROMATOGRAPHY

CHROMATOGRAPHY

Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies.

4

Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin.

187

Concentration of certain myxoviruses with polyethylene glycol.

378

Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis.

391

Lanjan virus, a new agent isolated from *Dermacentor auratus* in Malaya.

437

Fluorodensitometric measurement of aflatoxin thin layer chromatograms.

451

Rapid cleanup for carbaryl, using channel layer chromatography.

476

The use of gas chromatography in detecting lindane in sewage effluent.

483

Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate.

485

Collaborative study of the thin layer chromatographic method for carbaryl residues, in apples and spinach.

486

Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography.

491

Pesticide residues in ointment bases of natural origin.

496

Improved GLC method for s-triazine residue determination.

498

Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry.

534

Separation of penicillins by paper and thin layer chromatography.

558

The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography.

562

Collaborative study of gas chromatographic analysis of heptachlor content of formulations.

563

CHROMOSOMES

Metabolic control mechanisms in insects.

98

The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig.

181

Mite chromosomes; an exceptionally small number.

183

Genetic study of a mutation modifying the sensitivity of a lambda phage to immunity.

184

Effect of gibberellic acid on gamma irradiated barley seeds.

531

CHRYSANTHEMUM

Tests with insecticides for the control of resistant *Myzus persicae* (Sulzer) on year-round chrysanthemums.

277

CHYLE

A study of proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*.

77

Comparative study of the enzymatic hydrolysis of the crystals of the strains of *Bacillus thuringiensis* serotype I Berliner and serotype II An-duze.

114

CICADELLIDAE

Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus.

279

CIPC

New possibilities of weed control in chicory (*Cichorium intybus*).

317

CITRUS

Citrus culture.

202

Old and new Acaridae, citrus plant parasites in Italy.

274

CITRUS NURSERIES

Citrus culture.

202

CLADOSPORIUM CUCUMERINUM

Shifts in disease resistance induced by growth regulators.

514

CLAVICEPS PURPUREA

Is ergot infection unimportant.

220

CLIMATE

The effect of bioclimate on the communication system of night-flying moths.

170

Defoliation in Vietnam.

214

Sampling pests and diseases of tea. II.

254

CLONES

Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu lato (Hemipt. Aphid.).

127

CLOSTRIDIUM PERFRINGENS

Collaborative study of a quantitative method for *Clostridium perfringens* in foods.

455

Retailing of barbecued chickens: A Canadian survey.

459

CLOVER

Varietal resistance to clover rot in white clover.

217

COAGULASE

A new type in experimental intraperitoneal infection of staphylococci in mice.

414

False-positive coagulase reactions in the characterization of microorganisms isolated from foods.

457

COCCIDAE

Four new species and a new genus of Coccidae (Homoptera: Coccoidea) from Africa.

32

COCCIDIOSIS

Notice of filing of petition for food additives decoquinat and procaine penicillin.

379

The effects of various drugs on experimental chicken coccidiosis.

425

COCCUS

Four new species and a new genus of Coccidae (Homoptera: Coccoidea) from Africa.

32

COFFEE

Coffee berry disease.

226

Some facts about fungicides.

262

Pest profiles III. - White borer.

271

Observations on the control of the coffee berry borer, *Hypothenemus hampei* (Ferr.), with endosulfan in Uganda.

280

Survey of green coffee for potential aflatoxin contamination.

456

Note on analysis of aflatoxins in green coffee.

462

COFFEE BERRY DISEASE

Coffee berry disease.

226

Some facts about fungicides.

262

COLD

Resistance to cold in *Ceratonia catalpa*.

1

Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling.

529

COLEOPTERA

Forest insects.

57

Some remarks on the *Hydrophilidae* disease of the larvae of *Melolontha melolontha* C. (Col. Scarabaeidae).

105

Pest profiles III. - White borer.

271

COLLEMBOLA

A defense mechanism in *Onychiurus* (Collembola, Onychiuridae).

166

COLLETOTRICHUM PAPAYAE

A note on the isolation and chemical characteristics of antifungal agents from extracts of *Anagallis arvensis* L.

239

COLON

Effectiveness of antibacterials infused into the proximal colon on the pig.

426

COLOR

Integumental pigments of the millipede, *Polydesmus angustus* (Latzel).

133

From grasshopper to a locust.

141

Carotenoid compounds. Patent 3,408,406.

552

COLORIMETRY

Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate.

485

Collaborative study of a colorimetric method for paraquat in formulations.

550

Colorimetric method for the determination of Dichlorovos (DDVP).

561

COMMUNICATIONS

The effect of bioclimate on the communication system of night-flying moths.

170

COMPLEMENT FIXATION

The use of Brucella whey complement fixation test in a herd outbreak.

408

Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum.

429

COMPOSITAE

Invasion of grassland by *Baccharis pilularis* DC.

314

COMPOUND EYE

Image formation and sensory transmission in the compound eye.

70

SUBJECT INDEX

CURING

- CONFERENCES**
International colloquium on insect pathology and microbiological control. 74
- CONTAINERS**
Citrus culture. 202
Container growing. Chapter 22: Insects and diseases. 206
- CONTROL EQUIPMENT**
Application of insecticides to paddy water for more effective rice pest control. 205
- COPPER**
Problems of fungicidal efficiency. 255
Neural lesions in the offspring of female rats fed a copperdeficient diet. 349
The status of some micronutrients in healthy Robusta banana plants. 544
- COPRIS**
A revision of the genus *Copris* Muller of the Western Hemisphere (Coleoptera, Scarabacidae). matthews, e g. 5
- COPTOPTERYX GAYI**
The biology of *Coptopteryx gayi* (Blanchard) (Mantodea). 180
- CORN**
Methods concerning the determination of the effectiveness of insecticides against the European corn borer (*Ostrinia* (*Pyrausta*) *nubilalis* Hbn.) with small control tests and aerial chemical applications. 227
A minimum cultivation trial with maize using paraquat herbicide. 309
The state of weeds when applying herbicides and insecticides in corn fields. 318
Slugs cause damage in Ohio cornfields. 328
Improved GLC method for s-triazine residue determination. 498
Short-term growth response to growth regulators in roots of *Zea mays*. 515
Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
- COSTS**
Fly and economic evaluation of urban refuse systems. Part II:AN efficiency analysis of paper bag containers. 452
- COTTON**
Variation in the host-parasite relationship of a crop disease. 218
Hindsight and foresight can control cotton seedling disease. 222
Biology of the spiny bollworm. 278
- COVER CROPS**
Eelworms in tea: Some problems. 295
- COWPEAS**
Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523
- CRANBERRIES**
Recipe for modern handling. 575
- CROP LOSSES**
The occurrence of the important causes of damage to cultivated plants in Austria during 1967. 196
- Sampling pests and diseases of tea: III. 208
Is ergot infection unimportant. 220
Methods concerning the determination of the effectiveness of insecticides against the European corn borer (*Ostrinia* (*Pyrausta*) *nubilalis* Hbn.) with small control tests and aerial chemical applications. 227
The detection of primary infections of virus diseases in potato plant cultures. 244
Phytophthora leaf fall and pod rot. 252
Ratoon stunting disease and drought a disastrous combination. 259
The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees. 269
Slugs cause damage in Ohio cornfields. 328
Crop and livestock depredation reduced by wildlife services damage control programs. 579
- CROP ROTATION**
Sorghum on the move. 188
Verticillium wilt in the tomato cultures of the Valais. 231
The sugarbeet nematode. Problems and progress in its control in Colorado. 293
Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- CROP VARIETIES**
Variation in the host-parasite relationship of a crop disease. 218
Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand. 224
- CROP YIELDS**
How to produce high yields. 194
Plant protection and the economical position of farming. 195
Aphelenchoides bicaudatus, a parasite of cultivated mushroom. 299
Weed control in cereals. 305
A minimum cultivation trial with maize using paraquat herbicide. 309
Effect of topsoil deepening on weed infestation of following crops. 310
Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
Pesticides and perspective. 472
Reduction of parathion residue on celery. 497
GA increases tangelo yields. 530
Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533
The 'Local Angle'. 576
- CROPS**
The occurrence of the important causes of damage to cultivated plants in Austria during 1967. 196
- Varietal resistance to clover rot in white clover. 217
The susceptibility of some cultivated plants to *Sclerotium rolfsii* Sacc. 247
Chemical control of weeds in fields and in the open country. 302
Official FDA tolerances. 482
Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate. 485
- CROWN GALLS**
The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
- CROWS**
Studies on vibrionic infection of sheep and carrion crows. 450
- CRYSTALLOGRAPHY**
Note on aflatoxin M₁: Optical and X-ray crystallographic data. 560
- CUCULLIA ARGENTEA**
Sometimes old collections contain surprises. (Noctuidae). 10
- CUCUMBERS**
Didymella bryoniae, a new fungus parasite of cucumber cultures. 232
Shifts in disease resistance induced by growth regulators. 514
- CULEX PIPIENS QUINQUEFASCIATUS**
The studies of the behavior of *Culex pipiens fatigans* with special reference to dispersal, mating and feeding. 178
Trypanosoma glabra n. sp., parasite of Mexican frogs. Morphology and cycle in the vertebrate. 436
- CULICIDAE**
The susceptibility of various species of mosquitoes to DDT and dieldrin in Thailand. 179
Sterilization makes the mosquito hungry. 513
- CULTURE MEDIA**
Cytology of milky disease bacteria. II. Morphogenesis of *Bacillus popilliae* in vitro. 63
Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64
A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephestia*) *kuehniella* Zeller (Lepidoptera). 177
The factors determining the efficacy of biological preparations in plant protection. 229
Endotoxin properties of *Leptospira canicola*. 359
A selective-differential medium for detection of *Streptococcus agalactiae*. 367
Effect of atrazine on oats (*Avena sativa* var. Minhafer) I and II. (abstract). 490
The culture of *Phytophthora infestans* on fully synthetic culture medium substrata. 525
The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract). 566
- CURING**
Parathion residue in cured alfalfa. 495

SUBJECT INDEX

CUTICLE	
CUTICLE	
The defense mechanism of the cuticle of the sunn pest (<i>Eurygaster integriceps</i> Put.) against plant microorganisms.	83
Chitin orientation in cuticle and its control.	134
The chitin/protein complexes of insect cuticles.	144
CYASTERONE	
Structure of cyasterone, a novel C29 insect-moulting substance from <i>Cyathula capitata</i> .	163
CYATHULA CAPITATA	
Structure of cyasterone, a novel C29 insect-moulting substance from <i>Cyathula capitata</i> .	163
CYCLOHEXENES	
Lindane: Metabolism to a new isomer of pentachlorocyclohexene.	249
CYDIA POMONELLA	
The toxicity of insecticides to larvae of the codling moth, <i>Cydia pomonella</i> (L.). I. Intrinsic toxicity and persistence. (abstract).	95
CYNANDRA OPIS BERNARDII	
A new sub-species of <i>Cynandra opis</i> Drury.	34
CYPHERUS ROTUNDUS	
The chemical control of weeds in pineapple plantations.	319
CYTOCHROME OXIDASE	
Cytochrome c and evolution.	434
CYTOLOGY	
Cytology of milky disease bacteria. II. Morphogenesis of <i>Bacillus popilliae</i> in vitro.	63
Cytology of milky disease bacteria. I. Morphogenesis of <i>Bacillus popilliae</i> in vivo.	64
Concerning some aspects of tissue nourishing gall mites.	129
Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of <i>Equisetum</i> spore mother cells in syndetic stage.	526
CYTOPLASM	
Concerning some aspects of tissue nourishing gall mites.	129
Trichinosis and sarcosporidiosis in a puma.	380
D, 2,4-	
A comparison of post-emergence herbicides in young lucerne.	324
Effects of 2,4-D on emergence and seedling growth of range grasses.	510
Short-term growth response to growth regulators in roots of <i>Zea mays</i> .	515
DACTHAL	
New possibilities of weed control in chicory (<i>Cichorium intybus</i>).	317
DACTYLIS	
Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops.	541
DACUS OLEAE	
The olive fly, <i>Dacus oleae</i> Gmel. and its parasites in Corsica, in 1959 and 1960.	84
DAHLIA	
Nematodes can be controlled.	294
DAIRY CATTLE	
A selective-differential medium for detection of <i>Streptococcus agalactiae</i> .	367
Nutrient requirements of dairy cattle.	398
Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy.	473
DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract).	477
Dieldrin residue in an orchard-dairy area of Wisconsin.	481
DALAPON	
Tree line weed control in Goulburn Valley orchards.	325
DATES	
The effect of sowing dates on the reactions of six wheat strains to stem rust.	248
DDT	
Some experiences with the use of <i>Bacillus thuringiensis</i> Berl. against forest pests.	72
Residual effect of a number of insecticides on adults of the carabid <i>Pseudophonus rufipes</i> (Dej.).	79
The toxicity of insecticides to larvae of the codling moth, <i>Cydia pomonella</i> (L.). I. Intrinsic toxicity and persistence. (abstract).	95
The susceptibility of various species of mosquitoes to DDT and dieldrin in Thailand.	179
The gypsy moth threat in America.	216
A note on the control of the semi-cooper, <i>Achaea Janata</i> L., on castor.	291
Tick fever in poultry.	415
Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others.	470
Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966.	471
DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract).	477
Effect of DDT on temperature selection by young atlantic salmon, <i>Salmon solar</i> . (Abstract).	484
DDT storage in the U. S. population. (Abstract).	488
Long-term movement of DDT applied to soil for termite control.	492
Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract).	494
New developments in hybrid barley research.	520
The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography.	562
DECOQUINATE	
Notice of filing of petition for food additives decoquinat and procaine penicillin.	379
DEER	
Experimental bluetongue disease in white-tailed deer. Abstract.	428
Experimental bluetongue disease in white-tailed deer.	431
DEFICIENCY DISEASES	
Vitamin A deficiency: Effect on mosquito eye ultrastructure.	65
The boron status of deciduous fruit as reflected by leaf and fruit composition.	221
Control of race 2 <i>Fusarium</i> of tomatoes.	237
Dieback.	251
Manganous oxide (MnO) as a fertilizer for controlling manganese deficiency in oats.	257
Neural lesions in the offspring of female rats fed a copperdeficient diet.	349
Nutrient requirements of poultry.	397
Nutrient requirements of dairy cattle.	398
Effect of different patterns of excess amino acids on performance of chicks fed amino acid-deficient diets.	424
DEFOLIANTS	
Herbicides in Vietnam: AAAS board seeks field study.	316
DEFOLIATION	
Defoliation in Vietnam.	214
DEJANIRA	
On the genus <i>Dejanira</i> Thomson (Col. Cerambycidae Cerambycinae).	53
DEMOGRAPHY	
DDT storage in the U. S. population. (Abstract).	488
DEODORIZING	
Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat.	480
DEOXYRIBONUCLEIC ACID	
Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation.	407
Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation.	423
Effect of ecdysone on the puparium formation in irradiated <i>Ephestia kuehniella</i> Z.	532
DERMACENTOR	
Lanjan virus, a new agent isolated from <i>Dermacentor auratus</i> in Malaya.	437
DERMESTES FRISCHII	
The protection of dried sea-fish from infestation by <i>Dermestes frischii</i> Kug.	96
DESMODIUM	
A field trial with phenoxybutyric herbicides on tropical forage legumes.	308
DIAGNOSIS	
A new <i>Nosema</i> sp. of <i>Euproctis chrysorrhoea</i> L.	120
Diagnosis: A central pillar of insect pathology.	162
Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand.	224
Verticillium wilt in the tomato cultures of the Valais.	231

- Didymella bryoniae, a new fungus parasite of cucumber cultures. 232
- The detection of primary infections of virus diseases in potato plant cultures. 244
- Phytophthora leaf fall and pod rot. 252
- Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR. 343
- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344
- A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348
- Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351
- Erysipelas—our costliest pig disease. 352
- Acute and chronic erysipelotheix rhusiopathiae infection in rats: Histopathological examination. 362
- Studies on the epidemiology of vesicular stomatitis virus. 376
- The practice of the present diagnostic of rabies. 377
- Card brucellosis test... swine. 382
- Isolation and characterization of a porcine enterovirus. 386
- Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406
- Prevention, diagnosis and treatment of disease. 409
- An outbreak of rabies in swine. 413
- Differentiation of mycobacteria isolated from domestic animals. 422
- Hyostrongylus rubidus: A field study of its pathogenesis, diagnosis and treatment. 440
- Diagnostic station near Dunedin is New Zealand's watchdog against disease. 441
- The status of some micronutrients in healthy Robusta banana plants. 544
- DIAZINON**
Controlling the Mexican bean beetle. 56
- DICHLORO-2,2-BIS(P-CHLOROPHENYL) ETHYLENE, 1,1-**
Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others. 470
- DICHLOROPHENOXY) BUTYRIC ACID, 4-(2,4-**
A field trial with phenoxybutyric herbicides on tropical forage legumes. 308
- A comparison of post-emergence herbicides in young lucerne. 324
- DICHLORVOS**
Can one reconcile the control of San Jose scale (Quadraspidiotus perniciosus Comst.) with the fight against the carpocapsa (Carpocapsa pomonella L.). 125
- Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444
- Colorimetric method for the determination of Dichlorovos(DDVP). 561
- DIDYMELLA BRYONIAE**
Didymella bryoniae, a new fungus parasite of cucumber cultures. 232
- DIEBACK**
Dieback. 251
- DIELDRIN**
Residual effect of a number of insecticides on adults of the carabid Pseudophonus rufipes (Dej.). 79
- The susceptibility of various species of mosquitoes to DDT and dieldrin in Thailand. 179
- Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others. 470
- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat. 480
- Dieldrin residue in an orchard-dairy area of Wisconsin. 481
- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
- Dieldrin effects in two generations of penned hen pheasants. 502
- The situation regarding the use of aldrin and dieldrin in Europe. 504
- DIET**
Marking insects with dietary manganese for detection by neutron activation. 41
- Vitamin A deficiency: Effect on mosquito eye ultrastructure. 65
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of Myzus persicae (Sulz.) and Brevicoryne brassicae (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- Neural lesions in the offspring of female rats fed a copperdeficient diet. 349
- Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig. 370
- Trichinosis and sarcosporidiosis in a puma. 380
- Effect of different patterns of excess amino acids on performance of chicks fed amino acid-deficient diets. 424
- Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- DIETHYLPYROCARBONATE**
Permissive chemical. 568
- DIFFUSION**
Growth of Sclerotium rolfsii at different concentrations of oxygen and carbon dioxide. 523
- DIGESTION**
Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig. 370
- DIHYDROXYDIPHENYL SULFONE, 2,2'**
Mono-ethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and monoethers. Patent 3,408,402. 547
- DIISOPROPYL-ETHYLSULFINYLMETHYL-DITHIOPHOSPHATE, O,O**
O,o-diisopropyl-ethylsulfinylmethyl-dithiophosphate. Patent 3,408,426. 569
- DIMETHOATE**
Controlling the Mexican bean beetle. 56
- DINITROBUTYLPHENOL**
A comparison of post-emergence herbicides in young lucerne. 324
- DIPAROPSIS WATERSI**
Multiple parasitism in Diparopsis watersi Roths. (Lep. Agrotidae). 90
- DIPLODIA NATALENSIS**
Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of Pings caribaea in trinidad. 207
- DIPRIONIDAE**
Considerations on the toxic and labile substance produced by Bacillus thuringiensis var. thuringiensis Berliner (labile exotoxin). 154
- DIPTERA**
Original descriptions, synonyms and geographical distribution of the species of the Syrphidae (Diptera) family in chile. 24
- Biological observations on Rhabdophaga ramicola Rubs. 40
- The Diptera described by W. J. Rainbow from Funafuti Atoll, Ellice Islands. 43
- A new Japanese species of Atherigona Rond. (Diptera: Muscidae) reared from sugar-cane. 44
- Fly enemies...your allies. 117
- Complement to the study of the larval biology of Sympteticus costatus Loew (Diptera Nemes-trinidae), a grasshopper parasite, and general considerations on the biology of Nemes-trinidae. 118
- DIIQUAT**
Tree line weed control in Goulburn Valley orchards. 325
- Collaborative study of an ultraviolet method for measuring diquat content in formulations. 549
- DIROFILARIASIS**
Blood chemical and cellular changes in canine dirofilariasis. 420
- DISEASE CONTROL**
Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406
- Prevention, diagnosis and treatment of disease. 409
- DISEASE TRANSMISSION**
Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus. 375

SUBJECT INDEX

DISTRIBUTION

DISTRIBUTION

- Nematodes of the Northern Great Plains. 300

DISULFOTON

- Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate. 479

DITYLENCHUS DIPSACI

- The increased attack of *Ditylenchus dipsaci* on onion caused by some fungicides. 297

DIURNAL RHYTHM

- Biting cycles and parity of the mosquito *Mansonia (Mansonioides) uniformis* (Theo.) in Ceylon. 146

DIURON

- The chemical control of weeds in pineapple plantations. 319

DOGS

- A focal point of pseudorabies of dogs in the Department of Ain. 366

- Tonsillar carcinoma in rural dogs. 405

- Blood chemical and cellular changes in canine dirofilariasis. 420

- Diagnostic station near Dunedin is New Zealand's watchdog against disease. 441

DOLICHOPODA GENICULATA

- Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61

- On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae). 138

DORATURA

- Contributions to the knowledge of Polish species of the genus *Doratura* J. Shlb. (Homoptera, Cicadellidae). 80

DOSAGE

- The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67

- Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests. 72

- Tests on standardization of *Bacillus thuringiensis* preparations. 100

- The role of the intestinal microflora of insects in the disease development brought about by *Bac. cereus* var. *galleriae*. 108

- Side effects of *Bacillus thuringiensis*. The effects on bees (*Apis mellifera* L.). 112

- Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia pomonella* L.). 142

- A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia ni*. 158

- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175

- Recommendations for chemical treatment of diseases of Hevea. 250

- New possibilities of weed control in chicory (*Cichorium intybus*). 317

- Rat poison and insecticide. 329

- Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with 10 and 25 milligrams of saponine per dose. 341

- Feline panleucopenia-a serological study. 356

- Tuberculosis in the pig and the tuberculin test. 388

- Modifications of the natural resistance to infection of mice treated by several histone fractions. 403

- Effectiveness of antibacterials infused into the proximal colon on the pig. 426

- Gains from worm drenching ewe hoggets in South Canterbury. 445

- Effect of DDT on temperature selection by young atlantic salmon, *Salmon solar*. (Abstract). 484

- Establishment of tolerances for pesticide residues. 493

- Morphological changes in wheat caused by the action of chlorocholichloride-CCC. 524

- The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562

- For safer ULV spraying. 571

DRIED FOOD

- The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96

DROUGHTS

- Ratoon stunting disease and drought a disastrous combination. 259

DRUG THERAPY

- On the occurrence and treatment of actinobacillosis in cattle. 235

- Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967. 339

- Drugs: How do you use them. 350

- Some effects of route of administration and dilution on the toxicity of carbon tetrachloride drenches for sheep. 361

- Anti-rabies vaccinations at the Montpellier Center in 1967. 383

- Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967. 384

- Anti-rabies vaccinations at the Pasteur Institute in 1967. 387

- The inactivation effect of beta-propiolactone on the virus or the classical fowl plague. 404

- Prevention, diagnosis and treatment of disease. 409

- Anti-rabies vaccinations at the Marseille Pasteur Center in 1967. 417

- The effects of various drugs on experimental chicken coccidiosis. 425

- Effectiveness of antibacterials infused into the proximal colon on the pig. 426

- Hyostrogylus rubidus*: A field study of its pathogenesis, diagnosis and treatment. 440

- Agricultural control measures against intestinal parasites in cattle. 446

DRUGS

- Drugs: How do you use them. 350

- Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406

- Drugs - their use and abuse. 501

DUCKLINGS

- A filterable, proliferating factor simulating autoimmunity in malarious and nonmalarious ducklings. 392

DUCKS

- An outbreak of duck virus enteritis (duck plague) in the United States. 395

DUSTING

- Everglades station kills horn flies with dust. 3

DYES

- Mono-ethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and monoethers. Patent 3,408,402. 547

EARIAS INSULANA

- Biology of the spiny bollworm. 278

ECDYSONE

- Effect of ecdysone on the puparium formation in irradiated *Ephestia kuehniella* Z. 532

ECHINOCHLOA CRUSGALLI

- Germination biology and the fight against the chickenmillet. 331

ECHINOCOCCOSIS

- Diagnostic station near Dunedin is New Zealand's watchdog against disease. 441

ECOLOGY

- Taxonomic problems in ecological research on entomophagous insects. 12

- Defoliation in Vietnam. 214

- Herbicides in Vietnam: AAAS board seeks field study. 316

- Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406

ECONOMICS

- Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand. 224

- How fungi infect stored grains. 261

- A minimum cultivation trial with maize using paraquat herbicide. 309

- Tree line weed control in Goulburn Valley orchards. 325

- Breast blisters in turkeys. 402

- Diagnostic station near Dunedin is New Zealand's watchdog against disease. 441

- Gains from worm drenching ewe hoggets in South Canterbury. 445

- Fly and economic evaluation of urban refuse systems. Part II. AN efficiency analysis of paper bag containers. 452

- Pollution costs money. 465

- Concentrate spraying. 570

SUBJECT INDEX

ENZYMES

- Molded from wood fibers, new family of products for variety of markets. 572
- Farmers' expenditures for custom pesticide service in 1964. 574
- ECTOPARASITES**
Effect of superparasitism on the development, sex ratio and progeny of *Bracon greeni* Ashmead. 139
- EDEMA DISEASE**
Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- EDUCATION**
Pest control, education, and the New Breed. 577
- EGGS**
The fate of immature housefly populations at low and high densities. 66
Research note: Observations on immune factors associated with arizona group infections in turkeys. 364
Penetration patterns of *Mycoplasma gallisepticum* and Newcastle disease virus through the outer structures of chicken eggs. 433
Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
Dieldrin effects in two generations of penned hen pheasants. 502
- ELATERIDAE**
Sex attractant of sugar beet wirework: Identification and biological activity. 55
- ELECTRODES**
Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- ELECTROLYTES**
Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565
- ELECTRON MICROSCOPES**
The chitin/protein complexes of insect cuticles. 144
Electron microscopic study of the intracellular rickettsia pathogenesis using *Melolontha melolontha* L. 169
Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage. 526
- ELECTRON MICROSCOPY**
New facts concerning the extrusion of microsporidian spores. 122
Directional growth of the urediospore germ tubes and stomatal penetration. 242
- ELECTRON TRANSPORT**
Inhibition of photosynthetic electron transport by ioxynil. 521
- ELECTRONS**
Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract). 353
- ELECTROPHORESIS**
Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nucleopolyhedrosis virus. 171
- Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis. 391
- ELMIDAE**
The subgenera of *Austrolimnius* (Coleoptera: Elmithidae). 31
- EMBRYOLOGY**
The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig. 181
- EMBRYOS**
Endotoxin properties of *Leptospira canicola*. 359
Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385
- EMPOASCA FLAVESCENS**
Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocybidae) grown on apple trees. 268
- ENCEPHALITIS**
An outbreak of rabies in swine. 413
- ENCYRTIDAE**
Palearctic encyrtids parasites of psyllids. 85
- ENDOCRINE GLANDS**
Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61
- ENDOSULFAN**
Observations on the control of the coffee berry borer, *Hypothenemus hampei* (Ferr.), with endosulfan in Uganda. 280
- ENDOTHAL**
Factors influencing the selectivity of herbicides. 500
- ENDOTOXINS**
Endotoxin properties of *Leptospira canicola*. 359
Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- ENDRIN**
A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract). 353
Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- ENERGY**
Nutrient requirements of dairy cattle. 398
Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- ENGINEERING**
68th annual report of the Bureau of Sugar Experiment Stations. 191
- ENTERITIS**
An outbreak of duck virus enteritis (duck plague) in the United States. 395
- ENTEROVIRUSES**
Isolation and characterization of a porcine enterovirus. 386
- ENTOMOGENOUS BACTERIA**
General aspects of bacteriological control. 99
- ENTOMOGENOUS FUNGI**
Notes on entomophthoraceous fungi in Poland. 60
Insect mycology: Glances and perspectives. 131
- Observations and studies on extomophagous fungi in Hungary. 165
- ENTOMOLOGISTS**
Secrets of the insects. 2
- ENTOMOLOGY**
Bibliography of biological control, V. 87
Bibliography of biological control, VI. 88
68th annual report of the Bureau of Sugar Experiment Stations. 191
- ENTOMOPHTHORACEAE**
Notes on entomophthoraceous fungi in Poland. 60
- ENVIRONMENT**
Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89
Environmental humidity and the susceptibility of larvae of *Anagasta kuhniella* Zell. to *Bacillus thuringiensis* Berliner. 91
Look what's happening to insect control. 94
Notonecta borealis Bueno and Hussey (Hem., Notonectidae): A flightless species. 150
The influence of herbicides on the incidence of disease with particular reference to temperate fruit crops. 238
Phytophthora leaf fall and pod rot. 252
Sampling pests and diseases of tea. II. 254
Sagebrush reinvasion as affected by some environmental influences. 312
Sainfoin - a dryland forage crop for Montana. 322
Pollution costs money. 465
Defense possibilities of society against pollution of food and environment. 466
First report of the regular limnological survey of Lake Biwa (Oct. 1965-Dec. 1966) V. Abiotic environment. 559
Apparent sap velocities in big sagebrush as related to nearby environment. 573
- ENZYMES**
Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4
A study proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 77
Metabolic control mechanisms in insects. 98
Comparative study of the enzymatic hydrolysis of the crystals of the strains of *Bacillus thuringiensis* serotype I Berliner and serotype II Anduze. 114
Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract). 353
Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512
Peroxidase isozymes in barley leaves from irradiated seeds. 554

SUBJECT INDEX

EPHEDRUS PERSICAE

EPHEDRUS PERSICAE

Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae).

160

EPHESTIA

Infectiousness of coccidians for insects.

174

Effect of ecdysone on the puparium formation in irradiated *Ephestia kuehniella* Z.

532

EPIDEMIOLOGY

Problems of public health and medical entomology.

186

The gypsy moth threat in America.

216

Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960.

236

Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder.

260

Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR.

343

Studies on the epidemiology of vesicular stomatitis virus.

376

An outbreak of duck virus enteritis (duck plague) in the United States.

395

An outbreak of rabies in swine.

413

EPILACHNA VARIVESTIS

Controlling the Mexican bean beetle.

56

EPINEPHRINE

The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note).

130

EPIZOOTIC DISEASES

Epizootiology of bluetongue. Abstract.

390

EQUIPMENT

Everglades station kills horn flies with dust.

3

Official register of plant protection preparations and equipment 1968.

189

Official register of plant protection preparations and equipment 1967.

190

Sampling pests and diseases of tea: III.

208

Pollution costs money.

465

For safer ULV spraying.

571

Recipe for modern handling.

575

The 'Local Angle'.

576

EQUISETUM

Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage.

526

ERIOPHYIDAE

Concerning some aspects of tissue nourishing gall mites.

129

ERWINIA AMYLOVORA

Fireblight: A disease we don't want.

230

ERYSIPELAS BACTERINS

Erysipelas--our costliest pig disease.

352

ERYSIPELOTHRIX INSIDIOSA

The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V.

344

A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test.

348

Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment.

351

Erysipelas--our costliest pig disease.

352

Acute and chronic erysipelotheix rhusiopathiae infection in rats: Histopathological examination.

362

ESCHERICHIA COLI

Control by ovarian status of induced leukocytic responses in the sheep uterus.

346

Endotoxin properties of *Leptospira canicola*.

359

Swine mastitis-metritis agalactia syndrome.

369

Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock.

396

ESTERASES

The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract).

566

ETHERS

Mono-ethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and mono-ethers. Patent 3,408,402.

547

ETHION

Ethion a new acaricide for control of red spider, scarlet, pink and purple mites.

284

ETHYLENE

DDT storage in the U. S. population. (Abstract).

488

ETHYLENE OXIDE

Isolation and determination of chlorohydrins in foods fumigated with ethylene oxide or with propylene oxide.

489

ETHYLENEDIAMINETETRAACETIC ACID

False-positive coagulase reactions in the characterization of microorganisms isolated from foods.

457

ETIOLOGY

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis.

406

EUBLEMMA AMABILIS

Effect of superparasitism on the development, sex ratio and progeny of *Bracon greeni* Ashmead.

139

EURYGASTER INTEGRICEPS

The defense mechanism of the cuticle of the sunn pest (*Eurygaster integriceps* Put.) against plant microorganisms.

83

EXCRETA

Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy.

473

EXHAUST GASES

Photochemical and exhaust fume damage to plants.

193

EXPERIMENTAL DESIGN

Computing a population budget from sequentially sacrificed, replicated cultures.

156

EXPERIMENTAL INSECTS

Vitamin A deficiency: Effect on mosquito eye ultrastructure.

65

The fate of immature housefly populations at low and high densities.

66

Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.).

86

A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.).

159

EXTRACTS

Partial purification of sugarcane mosaic virus by filtration through gel.

219

Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch).

267

Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography.

491

EYES

Vitamin A deficiency: Effect on mosquito eye ultrastructure.

65

Image formation and sensory transmission in the compound eye.

70

Pinkeye in cattle.

432

FARMING METHODS

The 'Local Angle'.

576

FASCIOLA HEPATICA

The life span of *Fasciola hepatica* in cattle.

448

FASCIOLIASIS

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis.

406

The life span of *Fasciola hepatica* in cattle.

448

FAT BODY

The biochemistry of the insect fat body.

110

Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infested with the nucleopolyhedrosis virus.

171

FATS

Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig.

370

DDT storage in the U. S. population. (Abstract).

488

FEATHERS

Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue.

453

FECES

Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig.

370

FEED

Sainfoin - a dryland forage crop for Montana.

322

The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding.

342

Notice of filing of petition for food additives decoquinat and procaine penicillin.

379

Nutrient requirements of poultry.

397

- Nutrient requirements of dairy cattle. 398
- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475
- Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate. 479
- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
- Collaborative study of microbiological assay of oxytetracycline in feeds. 545
- Carotenoid compounds. Patent 3,408,406. 552
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- FEEDERS**
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- FEEDING**
- Feeding behavior and nutrition in grasshoppers and locusts. 75
- The effect of feeding the tsetse fly *Glossina morsitans* Westw. on impala blood. 113
- Infestation of emulsion paint by the fly *Megaselia scalaris* (Loew) (Dipt., Phoridae). 126
- Pre-gravid phase of ovarian development in *Aedes detritus* haliday. 151
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- The studies of the behavior of *Culex pipiens fatigans* with special reference to dispersal, mating and feeding. 178
- Spruce galls in Wisconsin. 241
- Eelworm in tea: Some important groups. 296
- FEEDS**
- Nutrient requirements of horses. 399
- FELINE INFECTIOUS ENTERITIS**
- Feline panleucopenia- a serological study. 356
- FELIS CONCOLOR**
- Trichinosis and sarcosporidiosis in a puma. 380
- FENTIN ACETATE**
- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509
- FERMENTATION**
- Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555
- Permissive chemical. 568
- FERTILITY**
- Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.). 86
- Dieldrin effects in two generations of penned hen pheasants. 502
- FERTILIZER APPLICATION**
- Farmers' expenditures for custom pesticide service in 1964. 574
- FERTILIZERS**
- Citrus culture. 202
- Tempting the soybean's erratic appetite. 228
- Arc fertilizers creating pollution problems. 468
- Manganese toxicity in tomato seedlings. 518
- Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524
- FEVER**
- Tick-borne diseases of cattle in Trinidad. 438
- FIELD CROPS**
- Use of petroleum oils and herbicide mixtures to improve weed control performance. 303
- Atrazine in oil in South Dakota. 323
- Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478
- Crop and livestock depredation reduced by wildlife services damage control programs. 579
- FILTERS**
- Partial purification of sugarcane mosaic virus by filtration through gel. 219
- FIRE BLIGHT**
- Fireblight: A disease we don't want. 230
- FISH**
- The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96
- Official FDA tolerances. 482
- FLACHERIE**
- Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus. 182
- FLOWERS**
- Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89
- Weed control for the home garden. 306
- Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- FLUORESCENCE**
- The practice of the present diagnostic of rabies. 377
- Solid state fluorescence emission of aflatoxins on silica gel. 460
- FLUORESCENT ANTIBODY TECHNIC**
- A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348
- Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393
- An outbreak of rabies in swine. 413
- Isolation of rabies virus from fruit bats in Thailand. 419
- Immunofluorescent screening for *Salmonella* in foods: Comparison with culture methods. 461
- FLUORIDES**
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- FLUORINE**
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- FLUOROMETRY**
- Fluorodensitometric measurement of aflatoxin thin layer chromatograms. 451
- FOLIAR APPLICATION**
- Application of insecticides to paddy water for more effective rice pest control. 205
- Control of Dalmatian toadflax. 320
- FOOD**
- Feeding behavior and nutrition in grasshoppers and locusts. 75
- Fly enemies...your allies. 117
- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475
- Isolation and determination of chlorohydrins in foods fumigated with ethylene oxide or with propylene oxide. 489
- FOOD ADDITIVES**
- Notice of filing of petition for food additives decoquinat and procaine penicillin. 379
- FOOD ANALYSIS**
- False-positive coagulase reactions in the characterization of microorganisms isolated from foods. 457
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- FOOD CONSUMPTION**
- Dieldrin effects in two generations of penned hen pheasants. 502
- FOOD CONTAMINATION**
- Fluorodensitometric measurement of aflatoxin thin layer chromatograms. 451
- Collaborative study of a quantitative method for *Clostridium perfringens* in foods. 455
- Survey of green coffee for potential aflatoxin contamination. 456
- Analysis for aflatoxin M in milk. 458
- Retailing of barbecued chickens: A Canadian survey. 459
- Solid state fluorescence emission of aflatoxins on silica gel. 460
- Immunofluorescent screening for *Salmonella* in foods: Comparison with culture methods. 461
- Note on analysis of aflatoxins in green coffee. 462
- Retailing of barbecued chickens: A survey in British Columbia. 463
- Note on the simultaneous use of polyvalent H and Spicer-Edwards H antisera as a preliminary step in the identification of *Salmonellae*. 464
- Defense possibilities of society against pollution of food and environment. 466
- Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- FOOD PLANTS**
- Pesticides and perspective. 472

SUBJECT INDEX

FOOD POISONING

FOOD POISONING

The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note).

130

FOOD SANITATION

The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L.

389

Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue.

453

FOOD STORAGE

The protection of dried sea-fish from infestation by *Dermestes frischii* Kug.

96

FOOT-AND-MOUTH DISEASE

Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with 10 and 25 milligrams of saponine per dose.

341

Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum.

429

FOOT-AND-MOUTH DISEASE VIRUS

Application of stresses to foot-and-mouth disease virus.

358

FORAGE PLANTS

Sainfoin - a dryland forage crop for Montana.

322

Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate.

479

FOREIGN BODIES

Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue.

453

FOREST INSECTS

Forest insects.

57

Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests.

72

FORESTRY

Some impacts of beekeeping on the management of the Miombo in Tanzania.

213

FORESTS

Some impacts of beekeeping on the management of the Miombo in Tanzania.

213

Defoliation in Vietnam.

214

FORMALDEHYDE

Diagnostic station near Dunedin is New Zealand's watchdog against disease.

441

FORMULATIONS

Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin.

187

Collaborative study of an ultraviolet method for measuring diquat content in formulations.

549

Collaborative study of a colorimetric method for paraquat in formulations.

550

FOWL PLAGUE VIRUS

The inactivation effect of beta-propiolactone on the virus or the classical fowl plague.

404

FREEZE DRYING

Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat.

480

FREQUENCY DISTRIBUTION

A model of the plant-to-plant movement of aphids. I. Description of the model.

153

FROGS

Trypanosoma glabra n. sp., parasite of Mexican frogs. Morphology and cycle in the vertebrate.

436

FRUIT

The biology of *Thanatopsycha chilensis* (Philippi). (Lepidoptera).

101

Pollination with the spray apparatus.

209

The boron status of deciduous fruit as reflected by leaf and fruit composition.

221

Protection against virus diseases, an essential aspect of maintenance breeding in fruit growing in Czechoslovakia.

223

The influence of herbicides on the incidence of disease with particular reference to temperate fruit crops.

238

Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch).

267

Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocyidae) grown on apple trees.

268

The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees.

269

Control of insect and mite pests of small fruits.

283

New weed killers boost orchard conservation.

304

A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii.

327

Official FDA tolerances.

482

Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography.

491

Effects of gibberellic acid on flower thinning and bloom delay of stone fruits.

517

FUMES

Photochemical and exhaust fume damage to plants.

193

FUMIGANTS

Nematodes can be controlled.

294

FUMIGATION

The effect of temperature and fumigation on the nitrification rate in soil.

215

Disease prevention.

330

Isolation and determination of chlorohydrins in foods fumigated with ethylene oxide or with propylene oxide.

489

Establishment of tolerances for pesticide residues.

493

Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops.

541

FUNGI

Problems of fungicidal efficiency.

255

Mastitis prevention and control.

416

The culture of *Phytophthora infestans* on fully synthetic culture medium substrata.

525

FUNGICIDES

The defense mechanism of the cuticle of the sunn pest (*Eurygaster integriceps* Put.) against plant microorganisms.

83

Insect mycology: Glimpses and perspectives.

131

Container growing. Chapter 22: Insects and diseases.

206

Pests are endangering our cultivated plants.

211

Hindsight and foresight can control cotton seedling disease.

222

A note on the isolation and chemical characteristics of antifungal agents from extracts of *Anagallis arvensis* L.

239

Recommendations for chemical treatment of diseases of Hevea.

250

Control of lettuce leaf drop by soil drenching with fungicides.

253

Problems of fungicidal efficiency.

255

Some facts about fungicides.

262

Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups.

263

The increased attack of *Ditylenchus dipsaci* on onion caused by some fungicides.

297

The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view.

509

Translocation of systemic fungicides.

519

On the antibiotically active substances of the tulip (*Tulipa gesneriana*).

543

FUNGUS DISEASES (INSECTS)

The use of micro-organisms for the control of insect pests.

136

FUNGUS DISEASES (PLANTS)

Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of *Pings caribaea* in Trinidad.

207

Pests are endangering our cultivated plants.

211

Varietal resistance to clover rot in white clover.

217

Is ergot infection unimportant.

220

Hindsight and foresight can control cotton seedling disease.

222

Coffee berry disease.

226

Verticillium wilt in the tomato cultures of the Valais.

231

Didymella bryoniae, a new fungus parasite of cucumber cultures.

232

Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches.

233

Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960.

236

Control of race 2 *Fusarium* of tomatoes.

237

SUBJECT INDEX

GRASSES

- Status of seed treatment for barley smut control. 240
- Directional growth of the urediospore germ tubes and stomatal penetration. 242
- Physiological races of *Puccinia striiformis* in the wheat of Iran. 246
- The susceptibility of some cultivated plants to *Sclerotium rolfsii* Sacc. 247
- Recommendations for chemical treatment of diseases of Hevea. 250
- Dicback. 251
- Oat diseases and their control. 256
- How fungi infect stored grains. 261
- Some facts about fungicides. 262
- Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263
- Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn). 264
- Shifts in disease resistance induced by growth regulators. 514
- Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523
- FURNITURE**
Molded from wood fibers, new family of products for variety of markets. 572
- FUSARIUM OXYSPORUM LYCOPERSICI**
Control of race 2 *Fusarium* of tomatoes. 237
- FUSARIUM ROSEUM**
Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263
- FUSARIUM SOLANI**
Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263
- GALL-MAKING INSECTS**
A new species of gall gnat *Mamaevia* n.g.n.sp. (Diptera, Itonididae) from Bohemia. 48
- New species of palearctic *Torymidæ* (Hym. *Torymidæ*). 49
- Concerning some aspects of tissue nourishing gall mites. 129
- Current literature XIX: An annotated bibliography. 201
- GALLERIA**
Infectiousness of coccidians for insects. 174
- GALLERIA MELLONELLA**
The role of the intestinal microflora of insects in the disease development brought about by *Bac. cereus* var. *galleriae*. 108
- GAMMA GLOBULINS**
Blood chemical and cellular changes in canine dirofilariasis. 420
- GAMMA IRRADIATION**
A fruit pest is being sterilized. 272
- GAMMA RAYS**
Marking insects with dietary manganese for detection by neutron activation. 41
- Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation. 407
- Effect of gibberellic acid on gamma irradiated barley seeds. 531
- Effect of ecdysone on the puparium formation in irradiated *Ephestia kuehniella* Z. 532
- GASES**
Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523
- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- Collaborative study of gas chromatographic analysis of heptachlor content of formulations. 563
- GASTROENTERITIS**
The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447
- Retailing of barbecued chickens: A survey in British Columbia. 463
- GELS**
Partial purification of sugarcane mosaic virus by filtration through gel. 219
- GENES**
Heredity and disease in domestic animals. 394
- GENETICS**
Fenetic study of a mutation modifying the sensitivity of a lambda phage to immunity. 184
- GEOGRAPHY**
Sorghum on the move. 188
- GEOMETRIDAE**
Biological notes on eye-frequenting moths from North Thailand. 71
- GERM-FREE LIFE**
Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats. 427
- GIBBERELLA ZEA**
How fungi infect stored grains. 261
- GIBBERELIC ACID**
Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- GA increases tangelo yields. 530
- Effect of gibberellic acid on gamma irradiated barley seeds. 531
- Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
- GIBBERELLINS**
Gibberellin A23 in immature seeds of *Lupinus luteus*. 199
- Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch). 267
- Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534
- Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.). 542
- GLANDS (INSECTS)**
Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61
- On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae). 138
- GLOEOSPORIUM**
Recommendations for chemical treatment of diseases of Hevea. 250
- GLOSSINA AUSTENI**
The productivity of *Glossina austeni* Newst. maintained on cop-cared rabbits. 109
- GLOSSINA MORSITANS**
The effect of feeding the tsetse fly *Glossina morsitans* Westw. on impala blood. 113
- GLUTAMIC ACID**
Studies on wheat plants using 14C-labelled compounds. XXII. Incorporation into wheat protein. 536
- GLUTAMINE**
Studies on wheat plants using 14C-labelled compounds. XXII. Incorporation into wheat protein. 536
- GLYCEROL**
The biochemistry of sugars and polysaccharides in insects. 176
- GLYCOGEN**
The biochemistry of sugars and polysaccharides in insects. 176
- GLYCOPROTEINS**
The biochemistry of sugars and polysaccharides in insects. 176
- GLYPHOMERUS SIGNIFER**
New species of palearctic *Torymidæ* (Hym. *Torymidæ*). 49
- GOATS**
Strain variation in the response of *Haemonchus contortus* in sheep and goats given phenothiazine: Efficacy of N.F. and purified products on purc parasitic infections. 439
- GOLF COURSES**
Insect control on golf greens. 273
- GRAIN**
How fungi infect stored grains. 261
- Current status of cereal leaf beetle control efforts. 287
- Weed control in cereals. 305
- GRANULOSA CELL TUMOR**
Equine ovarian granulosa tumours. 372
- GRAPES**
Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand. 224
- Phylloxera: Scourge of the vineyard. 289
- External and internal symptomology on *Vitis* from plant sucking insects. 290
- GRASSES**
The chemical control of weeds in pineapple plantations. 319
- Effects of 2,4-D on emergence and seedling growth of range grasses. 510

SUBJECT INDEX

GRASSHOPPERS

GRASSHOPPERS

Feeding behavior and nutrition in grasshoppers and locusts.

75

Complement to the study of the larval biology of *Sympteticus costatus* Loew (Diptera: Nemes-trinidae), a grasshopper parasite, and general considerations on the biology of Nemes-trinidae.

118

From grasshopper to a locust.

141

GRAZING

DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract).

477

GREAT PLAINS

Nematodes of the Northern Great Plains.

300

GREENHOUSE CULTURE

Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials.

539

GROUNDWATER

Effect of agriculture on nitrate pollution of groundwater.

469

GROWTH FACTORS

The culture of *Phytophthora infestans* on fully synthetic culture medium substrata.

525

GRUBS

Developmental cycle and pathology of a microsporidiosis brought about by *Nosema melolonthae* (Krieg) comb. nov. in grubs of *Melolontha melolontha* (L.) (Col. Melolonthidae).

104

Get rid of grubs in a hurry.

435

GUINEA PIGS

Evaluation of *Brucella abortus* strain 45/20 bac-terins prepared with various adjuvants.

347

HAEMATOBIA IRRITANS

Everglades station kills horn flies with dust.

3

HAEMONCHUS CONTORTUS

Strain variation in the response of *Haemonchus contortus* in sheep and goats given phenothiazine: Efficacy of N.F. and purified products on pure parasitic infections.

439

The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967.

447

HAIR

Long or tactile setae and the microscopic or proprioceptor setae in an hypothetical segment of Lepidoptera.

81

Staining technique to differentiate insect frag-ments, bird feathers, and rodent hairs from plant tissue.

453

The toxicity of fly ash for cattle.

507

HALICTOPHAGUS

Further descriptions of *Halictophagus pontifex* Fox and *H. regina* Fox (Strepsiptera: Halic-tophagidae) from Uganda.

25

HALOBACTERIUM HALOBIUM

The outer layer of the cell envelope of *Halobac-terium halobium*.

564

HANDBOOKS

Oat diseases and their control.

256

HARDWOODS

The gypsy moth threat in America.

216

HARPALUS RUFIPES

Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.).

79

HARPYRHYNCHUS

Mite chromosomes; an exceptionally small number.

183

HARVESTING

Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches.

233

We Squashed the weeds.

326

HARVESTING DATE

Weed control in cereals.

305

HEALTH

Establishment of tolerances for pesticide residues.

493

HEART

Pathogenesis of the round heart syndrome in tur-keys.

410

HEAT

Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner.

68

Didymella bryoniae, a new fungus parasite of cu-cumber cultures.

232

Ratoon stunting disease and drought a disastrous combination.

259

Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups.

263

Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat.

480

HELIOPHOBIOUS PLANTS

How to produce high yields.

194

HELMINTHIASIS

Hyostrongylus rubidus: A field study of its pathogenesis, diagnosis and treatment.

440

HEMAGGLUTINATION

Concentration of certain myxoviruses with polyethylene glycol.

378

HEMATOLOGIC DISEASES

Medical parasitology and exotic pathology.

185

HEMIPTERA

Supplementary notes on the orbitalis (Westw.) group of *Antestiopsis* (Hemiptera, Pen-tatomidae).

26

HEMITARSONEMUS

Old and new *Acaridae*, citrus plant parasites in Italy.

274

HEMITARSONEMUS LATUS

Observations on the reproduction of *Hemitar-sonemus latus* (Banks) (*Acarina* Tarsonemidae).

137

HEPARIN

False-positive coagulase reactions in the charac-terization of microorganisms isolated from foods.

457

HEPTACHLOR

Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others.

470

Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat.

480

Persistence of chlorinated hydrocarbon insecti-cide residues in chicken tissues and eggs. (ab-stract).

494

Collaborative study of gas chromatographic analysis of heptachlor content of formulations.

563

HEPTACHLOR EPOXIDE

Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others.

470

HERBICIDES

Pests are endangering our cultivated plants.

211

Defoliation in Vietnam.

214

The influence of herbicides on the incidence of disease with particular reference to temperate fruit crops.

238

Decay of rubber wood in a replanting and its ef-fect on root disease.

245

Chemical weed control.

301

Chemical control of weeds in fields and in the open country.

302

Use of petroleum oils and herbicide mixtures to improve weed control performance.

303

New weed killers boost orchard conservation.

304

Weed control in cereals.

305

Weed control for the home garden.

306

Aquatic weed control.

307

A field trial with phenoxybutyric herbicides on tropical forage legumes.

308

A minimum cultivation trial with maize using paraquat herbicide.

309

Proposed program for accelerated weed control in Wyoming.

311

Chemical control of pigweed. Patent 3,408,176.

315

Herbicides in Vietnam: AAAS board seeks field study.

316

New possibilities of weed control in chicory (*Cichorium intybus*).

317

The state of weeds when applying herbicides and insecticides in corn fields.

318

The chemical control of weeds in pineapple plan-tations.

319

Control of Dalmatian toadflax.

320

Atrazine in oil in South Dakota.

323

A comparison of post-emergence herbicides in young lucerne.

324

Tree line weed control in Goulburn Valley orchards.

325

A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii.

327

Germination biology and the fight against the chickenmillet.

331

Determination of arsenic in organic arsonates.

474

SUBJECT INDEX

Improved GLC method for s-triazine residue determination. 498

Factors influencing the selectivity of herbicides. 500

Effects of 2,4-D on emergence and seedling growth of range grasses. 510

Inhibition of photosynthetic electron transport by ioxynil. 521

Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529

Influence of some aminotriazine herbicides on some soil fungi. 537

Collaborative study of an ultraviolet method for measuring diquat content in formulations. 549

Collaborative study of a colorimetric method for paraquat in formulations. 550

Farmers' expenditures for custom pesticide service in 1964. 574

HEREDITARY DISEASES
Heredity and disease in domestic animals. 394

HESPERIIDAE
Some interesting Rhopalocera of Eastern Spain. 13

Iconography of the eggs of the Lepidoptera fauna of Belgium. 147

HETERODERA SCHACHTII
The sugarbeet nematode. Problems and progress in its control in Colorado. 293

HEVEA
Recommendations for chemical treatment of diseases of Hevea. 250

HEVEA BRASILIENSIS
Decay of rubber wood in a replanting and its effect on root disease. 245

HIBERNATION
The Hessian fly. 281

HIDES
Get rid of grubs in a hurry. 435

HILL REACTION
Inhibition of photosynthetic electron transport by ioxynil. 521

HISTAMINE
Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337

HISTOLOGY
Trichinosis and sarcosporidiosis in a puma. 380

HISTONES
Modifications of the natural resistance to infection of mice treated by several histone fractions. 403

HISTOPATHOLOGY
Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351

HISTORY
The history of investigation of tumors in animals. 430

HOBBYA
Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species. 6

HOG CHOLERA
A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348

Cholera eradication progress report. 374

If vaccines go - Will hog cholera follow. 381

Isolation and characterization of a porcine enterovirus. 386

Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393

HOG CHOLERA VACCINES
If vaccines go - Will hog cholera follow. 381

HOG CHOLERA VIRUS
Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus. 375

Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385

Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393

HOMOPTERA
Four new species and a new genus of Coccidae (Homoptera: Coccoidea) from Africa. 32

Notes on some aphids from Vietnam, with description of a new species (Homoptera, Aphidodea). 51

External and internal symptomology on Vitis from plant sucking insects. 290

HORMONES
The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130

The biochemistry of sugars and polysaccharides in insects. 176

Swine mastitis-metritis agalactia syndrome. 369

Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538

HORSES
Equine ovarian granulosa tumours. 372

Nutrient requirements of horses. 399

HOST INDEXING (PLANTS)
Variation in the host-parasite relationship of a crop disease. 218

HOST-PARASITE RELATIONS
Complement to the study of the larval biology of *Sympteticus costatus* Loew (Diptera: Nemestrinidae), a grasshopper parasite, and general considerations on the biology of Nemestrinidae. 118

HOUSEHOLD PESTS
Household insecticides. 503

HUMAN DISEASES
Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967. 339

Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis. 355

A serological inquiry about brucellosis in Toulouse veterinary students. 363

Medical observations concerning ornithosis control in the poultry industry. 365

HYDROGEN-ION CONCENTRATION

Anti-rabies vaccinations at the Montpellier Center in 1967. 383

Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967. 384

Anti-rabies vaccinations at the Pasteur Institute in 1967. 387

Anti-rabies vaccinations at the Marseille Pasteur Center in 1967. 417

The history of investigation of tumors in animals. 430

Retailing of barbecued chickens: A survey in British Columbia. 463

HUMAN NUTRITION
The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96

The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389

HUMANS
Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin. 187

DDT storage in the U. S. population. (Abstract). 488

HUMIDITY
Environmental humidity and the susceptibility of larvae of *Anagasta kuhniella* Zell. to *Bacillus thuringiensis* Berliner. 91

The effective breadth and action of temik. (Experiences from Germany). 135

HUMUS
The effective breadth and action of temik. (Experiences from Germany). 135

HYALOMMA AEGYPTIUM
Resistance capacity of ticks against starvation under laboratory conditions. 140

HYALOPHORA CECROPIA
A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia* ni. 158

HYDRACRYLIC ACID BETA-LACTONE
Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167

The inactivation effect of beta-propiolactone on the virus or the classical fowl plague. 404

HYDROCARBONS
Lipid metabolism and function in insects. 92

Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471

The use of gas chromatography in detecting lindane in sewage effluent. 483

Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512

HYDROGEN PEROXIDE
Reduction of parathion residue on celery. 497

HYDROGEN-ION CONCENTRATION
Effects of temperature and water on viability and virulence of *Bacillus thuringiensis* var. *thuringiensis* Berliner spores. 106

Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260

SUBJECT INDEX

HYDROLYSIS

HYDROLYSIS

Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate.

485

On the antibiologically active substances of the tulip (*Tulipa gesneriana*).

543

The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract).

566

HYDROXYQUINOLINE

Quinoline derivatives: Part XIX. Potential amoebicidal agents.

551

HYMENOPTERA

Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species.

6

Forest insects.

57

HYOSCYAMUS

Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth.

540

HYOSTRONGYLUS RUBIDUS

Hyostromylus rubidus: A field study of its pathogenesis, diagnosis and treatment.

440

HYPHANTRIA CUNEA

Observations and studies on extomophagous fungi in Hungary.

165

HYPOTHENEMUS HAMPEI

Observations on the control of the coffee berry borer, *Hypothenemus hampei* (Ferr.), with endosulfan in Uganda.

280

HYPSIPYLA ROBUSTA

An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae.

286

ICTALURUS MELAS

Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract).

353

ILLUSTRATIONS

Oat diseases and their control.

256

IMIDAN

A note on the control of the semi-cooper, *Achaea Janata* L., on castor.

291

IMMUNITY

Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus.

182

Genetic study of a mutation modifying the sensitivity of a lambda phage to immunity.

184

Scrub tick paralysis in farm animals.

333

Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with I0 and 25 milligrams of saponine per dose.

341

Research note: Observations on immune factors associated with arizona group infections in turkeys.

364

A filterable, proliferating factor simulating autoimmunity in malarious and nonmalarious ducklings.

392

Heredity and disease in domestic animals.

394

Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate.

412

A consideration of insecticide effects on hypothetical avian populations.

499

IMMUNIZATION

Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967.

339

Two sides to the vaccine picture.

345

Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants.

347

Feline panleucopenia- a serological study.

356

Cholera eradication progress report.

374

Anti-rabies vaccinations at the Montpellier Center in 1967.

383

Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967.

384

Anti-rabies vaccinations at the Pasteur Institute in 1967.

387

A new type in experimental intraperitoneal infection of staphylococci in mice.

414

Anti-rabies vaccinations at the Marseille Pasteur Center in 1967.

417

Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum.

429

IMMUNOCHEMISTRY

Immunofluorescent screening for *Salmonella* in foods: Comparison with culture methods.

461

IMMUNOFLUORESCENCE

The practice of the present diagnostic of rabies.

377

IMMUNOLOGY

Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants.

347

Epizootiology of bluetongue. Abstract.

390

Comparative study of the pathogenic and immunogenic power of a new acapsulogenic strain of *Bacillus anthracis* (Ihtiman strain).

418

INDOLEACETIC ACID

Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch).

267

Shifts in disease resistance induced by growth regulators.

514

Short-term growth response to growth regulators in roots of *Zea mays*.

515

INDUSTRIAL MANAGEMENT

Pollution costs money.

465

Recipe for modern handling.

575

INDUSTRY

Concentrate spraying.

570

Molded from wood fibers, new family of products for variety of markets.

572

INFECTIOUS DISEASES

A new *Nosema* sp. of *Euproctis chrysorrhoea* L.

120

Protozoan and nematode infections of insects.

173

Medical parasitology and exotic pathology.

185

Disease prevention.

330

Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR.

343

The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V.

344

Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis.

355

Epizootiology of bluetongue. Abstract.

390

Experimental bluetongue disease in white-tailed deer. Abstract.

428

INFECTIOUS KERATITIS

Pinkeye in cattle.

432

INFRARED RAYS

The effect of bioclimate on the communication system of night-flying moths.

170

INHIBITORS

Permissive chemical.

568

INJECTIONS

The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note).

130

On the occurrence and treatment of actinobacillosis in cattle.

235

Urinary conversion products of injected progesterone-4-14-C in the domestic fowl.

332

Modifications of the natural resistance to infection of mice treated by several histone fractions.

403

Isolation of rabies virus from fruit bats in Thailand.

419

Lanjan virus, a new agent isolated from *Dermacentor auratus* in Malaya.

437

INOCELLIA KEISERI

Sialis nigripes Pictet, *Raphidia* (Agulla) *aloyisiana* Costa and *Inocellia keiseri* Aspöck, new for Switzerland. (Neuroptera s.l.).

22

INSECT ADAPTATION

Infestation of emulsion paint by the fly *Megaselia scalaris* (Loew) (Dipt., Phoridae).

126

Notonecta borealis Bueno and Hussey (Hem., Notonectidae): A flightless species.

150

INSECT ANATOMY

Vitamin A deficiency: Effect on mosquito eye ultrastructure.

65

Contributions to the knowledge of Polish species of the genus *Doratura* J. Shlb. (Homoptera, Cicadellidae).

80

Long or tactile setae and the microscopic or proprioceptor setae in an hypothetical segment of Lepidoptera.

81

On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae).

138

The effect of bioclimate on the communication system of night-flying moths.

170

INSECT BEHAVIOR

Secrets of the insects.

2

A massive invasion of <i>Stilpnotia salicis</i> . (Lymantriidae).	46
Sex attractant of sugar beet wirework: Identification and biological activity.	55
The present status of milky disease of Japanese beetle in Connecticut.	62
Biological notes on eye-frequenting moths from North Thailand.	71
Feeding behavior and nutrition in grasshoppers and locusts.	75
Species differences in scarab-pasture relationships.	76
The olive fly, <i>Dacus oleae</i> Gmel. and its parasites in Corsica, in 1959 and 1960.	84
Palaearctic encyrtids parasites of psyllids.	85
Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species.	89
Multiple parasitism in <i>Diparopsis watersi</i> Roths. (Lep. Agrotidae).	90
Observations on the reproduction of <i>Hemitarsonemus latus</i> (Banks) (Acarina Tarsonemidae).	137
From grasshopper to a locust.	141
The principal parasites observed on the leaf roller moths of Spain with particular attention to <i>Lymantria dispar</i> L.	143
Biting cycles and parity of the mosquito <i>Mansonia</i> (Mansonioides) <i>uniformis</i> (Theo.) in Ceylon.	146
On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homoglomerin, alkaloids from arthropods.	149
A model of the plant-to-plant movement of aphids. I. Description of the model.	153
The effects of insecticides on the interrelationship between <i>Aphis fabae</i> Scop. and some of its epites.	157
Investigations concerning the biological control of the apple moth (<i>Carpocapsa pomonella</i> (L.)) by means of egg parasites of the genus <i>Trichogramma</i> .	161
Structure of cyasterone, a novel C29 insect-moulting substance from <i>Cyathula capitata</i> .	163
A mathematical model for two <i>Tribolium</i> populations in competition.	164
A defense mechanism in <i>Onychiurus</i> (Collembola, Onychiuridae).	166
Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of <i>Myzus persicae</i> (Sulz.) and <i>Brevicoryne brassicae</i> (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions.	172
The studies of the behavior of <i>Culex pipiens fatigans</i> with special reference to dispersal, mating and feeding.	178
Ultrasound to stop the moths settling.	265

INSECT BIOLOGY

A revision of the genus <i>Copris</i> Muller of the Western Hemisphere (Coleoptera, Scarabacidae). Matthews, C.G.	5
Some biological notes on the pteromalid (Hym., Chalcidoidea) genera <i>Caenacis</i> Foerster, <i>Cecidostiba</i> Thomson and <i>Hobbia</i> Delucchi, with descriptions of two new species.	6
Original descriptions, synonyms and geographical distribution of the species of the Syrphidac (Diptera) family in Chile.	24
Biological observations on <i>Rhabdophaga ramicola</i> Ruls.	40
The biology and ecology of the Rhyparochrominae of New England (Heteroptera: Lygaeidae). I.	50
Biological notes on eye-frequenting moths from North Thailand.	71
The biology of <i>Orgyia antiqua</i> (Linnaeus). (Lepidoptera).	82
Butterflies, collecting and rearing.	93
The biology of <i>Thanatopsycha chilensis</i> (Philippi). (Lepidoptera).	101
Complement to the study of the larval biology of <i>Sympteticus costatus</i> Loew (Diptera Nemestrinidae), a grasshopper parasite, and general considerations on the biology of Nemestrinidae.	118
Morphological and biological investigations on clones and field populations of the foxglove-aphid, <i>Aulacorthum solani</i> KLTB. 1843 sensu latiore (Hemipt. Aphid.).	127
Effect of superparasitism on the development, sex ratio and progeny of <i>Bracon greeni</i> Ashmead.	139
Bionomics and ecology of <i>Ephedrus pulchellus</i> Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae).	160
Electron microscopic study of the intracellular rickettsia pathogenesis using <i>Melolontha melolontha</i> L.	169
The effect of bioclimate on the communication system of night-flying moths.	170
The biology of <i>Coptopteryx gayi</i> (Blanchard) (Mantodea).	180
The apple moth (<i>Recurvaria leucatella</i> Cl.) a little known pest of our fruit trees.	269
Insect control on golf greens.	273
Biology of the spiny bollworm.	278
Note on <i>Sphenarches anisodactylus</i> , Wkr. damaging bottle gourd (<i>Lagenaria lucantha</i> , Rusby).	285

INSECT COLLECTING EQUIPMENT

Butterflies, collecting and rearing.	93
--------------------------------------	----

INSECT COLLECTION

Hunting at night at Losheimgraben.	37
A good region: Barvaux s/Ourthe.	38
Butterflies, collecting and rearing.	93

INSECT CONTROL

Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442.	78
The protection of dried sea-fish from infestation by <i>Dermestes frischii</i> Kug.	96
Fly enemies...your allies.	117
Problems of public health and medical entomology.	186
Changes in the growth-regulator content of plum infested with fruit tree red spider mite, <i>Panonychus ulmi</i> (Koch).	267
A fruit pest is being sterilized.	272
Insect control on golf greens.	273
What happens when sprays are no longer needed for control of codling moth.	282
Control of insect and mite pests of small fruits.	283
Current status of cereal leaf beetle control efforts.	287
Phylloxera: Scourge of the vineyard.	289
Tick fever in poultry.	415

INSECT DISEASES

The biochemistry and mode of action of <i>Bacillus thuringiensis</i> Berliner and its varieties.	58
The measurement and interrelationships of infections with <i>Nosema apis</i> and <i>Malpighamoeba mellificae</i> of honey-bee populations.	59
Notes on entomophthoraceous fungi in Poland.	60
The present status of milky disease of Japanese beetle in Connecticut.	62
Cytology of milky disease bacteria. II. Morphogenesis of <i>Bacillus popilliae</i> in vitro.	63
Cytology of milky disease bacteria. I. Morphogenesis of <i>Bacillus popilliae</i> in vivo.	64
International colloquium on insect pathology and microbiological control.	74
Look what's happening to insect control.	94
Developmental cycle and pathology of a microsporidiosis brought about by <i>Nosema melolonthae</i> (Krieg) comb. nov. in grubs of <i>Melolontha melolontha</i> (L.) (Col. Melolonthidae).	104
Some remarks on the <i>Hydrophilina</i> disease of the larvae of <i>Melolontha melolontha</i> C.(Col. Scarabaeidae).	105
The role of the intestinal microflora of insects in the disease development brought about by <i>Bac. cereus</i> var. <i>galleriae</i> .	108
The fate of spores of <i>Nosema apis</i> Zander ingested by muscoid flies.	111
Side effects of <i>Bacillus thuringiensis</i> . The effects on bees (<i>Apis mellifera</i> L.).	112
A new <i>Nosema</i> sp. of <i>Euproctis chrysorrhoea</i> L.	120
The occurrence of a <i>Crithidia</i> species within the gut of the honey bee, <i>Apis mellifica</i> L.	121
New facts concerning the extrusion of microsporidian spores.	122

SUBJECT INDEX

INSECT DISSEMINATION

- Some thoughts on the taxonomy of *Bacillus thuringiensis* Berliner. 124
- Insect mycology: Glimpses and perspectives. 131
- The use of micro-organisms for the control of insect pests. 136
- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145
- A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia ni*. 158
- Diagnosis: A central pillar of insect pathology. 162
- Observations and studies on extomophagous fungi in Hungary. 165
- Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
- Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nucleopolyhedrosis virus. 171
- Protozoan and nematode infections of insects. 173
- Infectiousness of coccidians for insects. 174
- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta (Ephesia) kuehniella* Zeller (Lepidoptera). 177
- Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus. 182

INSECT DISSEMINATION

- The studies of the behavior of *Culex pipiens* fatigans with special reference to dispersal, mating and feeding. 178

INSECT ECOLOGY

- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae). 9
- Some thoughts on the Pterophoridae of the French fauna. 11
- The biology and ecology of the Rhyarochrominae of New England (Heteroptera: Lygaeidae). I. 50
- Biological notes on eye-frequenting moths from North Thailand. 71
- Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae). 160

INSECT EGGS

- Iconography of the eggs of the Lepidoptera fauna of Belgium. 47
- The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130
- Iconography of the eggs of the Lepidoptera fauna of Belgium. 147
- Iconography of the eggs of the Lepidoptera fauna of Belgium. 148
- Pre-gravid phase of ovarian development in *Aedes detritus* haliday. 151
- Computing a population budget from sequentially sacrificed, replicated cultures. 156

- Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* (L.)) by means of egg parasites of the genus *Trichogramma*. 161

- Mite chromosomes; an exceptionally small number. 183

- Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284

INSECT FLIGHT

- Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89

- The regulation of breathing in insects. 128

- Notonecta borealis* Bueno and Hussey (Hem., Notonectidae): A flightless species. 150

- The effect of bioclimate on the communication system of night-flying moths. 170

INSECT GENETICS

- The present status of milky disease of Japanese beetle in Connecticut. 62

- Amino acid and protein metabolism in insect development. 73

- The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig. 181

- Genetic resistance of the silkworm, *Bombyx mori* L., to an infection of a flacherie virus. 182

- Mite chromosomes; an exceptionally small number. 183

INSECT HISTOLOGY

- On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae). 138

INSECT IDENTIFICATION

- Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species. 6

- Descriptions of new and little known species of Mallophaga (Insecta) from maritime hosts of Chile, South America. 18

- Further descriptions of *Halictophagbus pontifex* Fox and *H. regina* Fox (Strepsiptera: Halictophagidae) from Uganda. 25

- The position of *Polistes* (Leptopolistes) *bischoffi* Weyrauch (Hymenoptera: Vespidae). 27

- The Diptera described by W. J. Rainbow from Funafuti Atoll, Ellice Islands. 43

- Notes on some aphids from Vietnam, with description of a new species (Homoptera, Aphidoidea). 51

- Forest insects. 57

- Species differences in scarab-pasture relationships. 76

- Contributions to the knowledge of Polish species of the genus *Doratura* J. Shlb. (Homoptera, Cicadellidae). 80

- Insect control on golf greens. 273

INSECT METABOLISM

- Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4

- Amino acid and protein metabolism in insect development. 73

- Lipid metabolism and function in insects. 92

- Metabolic control mechanisms in insects. 98

- The biochemistry of sugars and polysaccharides in insects. 176

INSECT MIGRATION

- Larval movement of *Lasioderma serricorne* (F.) (Coleoptera: Anobiidae) in a plane. 116

- Notonecta borealis* Bueno and Hussey (Hem., Notonectidae): A flightless species. 150

- A model of the plant-to-plant movement of aphids. I. Description of the model. 153

INSECT MORPHOLOGY

- A revision of the genus *Copris* Muller of the Western Hemisphere (Coleoptera, Scarabaeidae). matthews, e.g. 5

- Controlling the Mexican bean beetle. 56

- Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61

- Amino acid and protein metabolism in insect development. 73

- Butterflies, collecting and rearing. 93

- Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu latiore (Hemipt. Aphid.). 127

- Integumental pigments of the millipede, *Polydesmus angustus* (Latzel). 133

- On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae). 138

- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145

- Pre-gravid phase of ovarian development in *Aedes detritus* haliday. 151

- The gypsy moth threat in America. 216

- Biology of the spiny bollworm. 278

- The Hessian fly. 281

INSECT NAMES

- Notes on *Plebeius argyrognomon* Bgstr. (Lepidoptera, Lycaenidae). 54

- Butterflies, collecting and rearing. 93

INSECT NUTRITION

- Feeding behavior and nutrition in grasshoppers and locusts. 75

- Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia* *pomonella* L.). 142

INSECT OUTBREAKS

- A massive invasion of *Stilpnolia salicis*. (Lymantriidae). 46

INSECT PESTS

- Secrets of the insects. 2

- Controlling the Mexican bean beetle. 56

SUBJECT INDEX

INSECT TAXONOMY

- Look what's happening to insect control. 94
- General aspects of bacteriological control. 99
- From grasshopper to a locust. 141
- How to produce high yields. 194
- The occurrence of the important causes of damage to cultivated plants in Austria during 1967. 196
- Container growing. Chapter 22: Insects and diseases. 206
- Sampling pests and diseases of tea: III. 208
- Pests are endangering our cultivated plants. 211
- Ultrasound to stop the moths settling. 265
- Tender trap. (Abstract). 266
- The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees. 269
- The need for conserving natural enemies of pests. 270
- Pest profiles III. - White borer. 271
- A fruit pest is being sterilized. 272
- Insect control on golf greens. 273
- Virus insecticides. 275
- Control of insect and mite pests of small fruits. 283
- Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284
- Note on *Sphenarches anisodactylus*, Wkr. damaging bottle gourd (*Lagenaria lucantha*, Rusby). 285
- An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae. 286
- Get rid of grubs in a hurry. 435
- Reduction of parathion residue on celery. 497
- Household insecticides. 503
- INSECT PHYSIOLOGY**
- The fate of immature housefly populations at low and high densities. 66
- The excretion of nitrogen in insects. 69
- Image formation and sensory transmission in the compound eye. 70
- Amino acid and protein metabolism in insect development. 73
- Feeding behavior and nutrition in grasshoppers and locusts. 75
- Contributions to the knowledge of Polish species of the genus *Doratura* J. Shlb. (Homoptera, Cicadellidae). 80
- Lipid metabolism and function in insects. 92
- Melanin in an insect, *Lucilia cuprina* (Wied.). 97
- Metabolic control mechanisms in insects. 98
- The productivity of *Glossina austeni* Newst. maintained on cop-eared rabbits. 109
- The biochemistry of the insect fat body. 110
- The control of polymorphism in aphids. 115
- Larval movement of *Lasioderma serricorne* (F.) (Coleoptera: Anobiidae) in a plane. 116
- Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae). 123
- The regulation of breathing in insects. 128
- The properties of insect axons. 132
- Chitin orientation in cuticle and its control. 134
- The chitin/protein complexes of insect cuticles. 144
- Osmotic and ionic regulation in insects. 152
- Functional aspects of the organizaion of the insect nervous system. 155
- Structure of cyasterone, a novel C29 insect-moulting substance from *Cyathula capitata*. 163
- Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
- Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nuclearpolyhedroses virus. 171
- The biochemistry of sugars and polysaccharides in insects. 176
- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephestia*) *kuehniella* Zeller (Lepidoptera). 177
- The factors determining the efficacy of biological preparations in plant protection. 229
- Sterilization makes the mosquito hungry. 513
- Effect of ecdysone on the puparium formation in irradiated *Ephestia kuehniella* Z. 532
- INSECT REARING**
- Biological observations on *Rhabdophaga ramicola* Rubs. 40
- Marking insects with dietary manganese for detection by neutron activation. 41
- A new Japanese species of *Atherigona* Rond. (Diptera: Muscidae) reared from sugar-cane. 44
- The biology of *Orgyia antiqua* (Linnaeus). (Lepidoptera). 82
- Butterflies, collecting and rearing. 93
- The biology of *Thanatopsyche chilensis* (Philippi). (Lepidoptera). 101
- The productivity of *Glossina austeni* Newst. maintained on cop-eared rabbits. 109
- Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167
- INSECT REARING EQUIPMENT**
- Butterflies, collecting and rearing. 93
- INSECT REPELLENTS**
- Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin. 187
- INSECT RESPIRATION**
- Metabolic control mechanisms in insects. 98
- INSECT TAXONOMY**
- Secrets of the insects. 2
- A revision of the genus *Copris* Muller of the Western Hemisphere (Coleoptera, Scarabaeidae). matthews, e.g. 5
- The Nemouridae of Assam (Plectoptera). 7
- Contribution to the knowledge of the lepidoptera fauna of Iran. 8
- Some thoughts on the Pterophoridae of the French fauna. 11
- Materials for a revision of the genus *Oreopsyche* (Psychidae). 14
- Materials for a revision of the genus *Oreopsyche* (Psychidae). 15
- Listing of the trifold Noctuidae of France and Belgium. 16
- Notes on the classification of the Iberian families of *Parnassius apollo* (Papilionidae). 17
- Descriptions of new and little known species of Mallophaga (Insecta) from maritime hosts of Chile, South America. 18
- Bibliography on the systematics of entomophagous insects VI. 19
- Sialis nigripes* Pictet, *Raphidia* (*Agulla*) *aloyisiana* Costa and *Inocellia keiseri* Aspöck, new for Switzerland. (Neuroptera s.l.). 22
- Original descriptions, synonyms and geographical distribution of the species of the Syrphidae (Diptera) family in Chile. 24
- The position of *Polistes* (*Leptopolistes*) *bischoffi* Weyrauch (Hymenoptera: Vespidae). 27
- Tachinidae catch in the Swiss Jura, using tent traps. 30
- A deviant form of *Aglais urticae*. (Nymphalidae). 33
- A new sub-species of *Cynandra opis* Drury. 34
- New species for the Belgian fauna. 35
- Apamea pabulatricula* Brahm in Belgium. (Noctuidae). 36
- Hunting at night at Losheimergraben. 37
- Biological observations on *Rhabdophaga ramicola* Rubs. 40
- Trichogrammatidae--the smallest winged insects. 42
- A new species of gall gnat *Mamaevia* n.g.n.sp. (Diptera, Itonididae) from Bohemia. 48
- The biology and ecology of the Rhyparochrominae of New England (Heteroptera: Lygaeidae). I. 50
- Notes on some aphids from Vietnam, with description of a new species (Homoptera, Aphidodea). 51

SUBJECT INDEX

INSECT TRAPS

- An interesting specimen: *Celama centonalis* f. *litoralis* Paux. (Arctiidae Nolinae). 52
- On the genus *Dejanira* Thomson (Col. Cerambycidae Cerambycinae). 53
- Notes on *Plebeius argyrognomon* Bgstr. (Lepidoptera, Lycaenidae). 54
- Biological notes on eye-frequenting moths from North Thailand. 71
- A new genus and four new species of Aphids (Homoptera, Aphididae) from Poland. 103

INSECT TRAPS

- Tachinidae catch in the Swiss Jura, using tent traps. 30
- Tender trap. (Abstract). 266

INSECT TROPISM

- A defense mechanism in *Onychiurus* (Collembola, Onychiuridae). 166

INSECT VECTORS

- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae). 9
- Hybrids of *Nephotettix impicticeps* Ish. and *N. apicalis* (Motsch.) and their ability to transmit the tungro virus to rice. 119
- Problems of public health and medical entomology. 186
- Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin. 187
- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocybidae) grown on apple trees. 268
- Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus. 279
- Studies on the epidemiology of vesicular stomatitis virus. 376
- Trypanosoma glabra* n. sp., parasite of Mexican frogs. Morphology and cycle in the vertebrate. 436
- Lanjan virus, a new agent isolated from *Dermacentor auratus* in Malaya. 437
- Tick-borne diseases of cattle in Trinidad. 438

INSECTICIDE APPLICATION

- Controlling the Mexican bean beetle. 56
- The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
- The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96
- Can one reconcile the control of San Jose scale (*Quadraspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.). 125
- Application of insecticides to paddy water for more effective rice pest control. 205
- Control of insect and mite pests of small fruits. 283
- Parathion residue in cured alfalfa. 495

INSECTICIDE RESIDUES

- The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
- The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96
- Fly enemies...your allies. 117
- Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others. 470
- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract). 477
- Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate. 479
- Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat. 480
- The use of gas chromatography in detecting lindane in sewage effluent. 483
- Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate. 485
- DDT storage in the U. S. population. (Abstract). 488
- Effect of atrazine on oats (*Avena sativa* var. Min-hafer) I and II. (abstract). 490
- Long-term movement of DDT applied to soil for termite control. 492
- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
- Parathion residue in cured alfalfa. 495
- Pesticide residues in ointment bases of natural origin. 496
- Reduction of parathion residue on celery. 497
- A consideration of insecticide effects on hypothetical avian populations. 499

INSECTICIDE RESISTANT INSECTS

- Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4
- The susceptibility of various species of mosquitoes to DDT and dieldrin in Thailand. 179
- The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees. 269
- Tests with insecticides for the control of resistant *Myzus persicae* (Sulzer) on year-round chrysanthemums. 277
- Insect resistant thermoplastic compositions. Patent 3,408,323. 556

INSECTICIDES

- Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4
- Controlling the Mexican bean beetle. 56

The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67

- Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79
- Insect mycology: Glimpses and perspectives. 131
- The properties of insect axons. 132
- The effective breadth and action of temik. (Experiences from Germany). 135
- The use of micro-organisms for the control of insect pests. 136
- The effects of insecticides on the interrelationship between *Aphis fabae* Scop. and some of its episites. 157
- A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159
- Problems of public health and medical entomology. 186
- Container growing. Chapter 22: Insects and diseases. 206
- Pests are endangering our cultivated plants. 211
- Methods concerning the determination of the effectiveness of insecticides against the European corn borer (*Ostrinia (Pyrausta) nubilalis* Hbn.) with small control tests and aerial chemical applications. 227
- The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees. 269
- Virus insecticides. 275
- Tests with insecticides for the control of resistant *Myzus persicae* (Sulzer) on year-round chrysanthemums. 277
- Control of insect and mite pests of small fruits. 283
- The state of weeds when applying herbicides and insecticides in corn fields. 318
- Rat poison and insecticide. 329
- Scrub tick paralysis in farm animals. 333
- Get rid of grubs in a hurry. 435
- Rapid cleanup for carbaryl, using channel layer chromatography. 476
- DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract). 477
- Dieldrin residue in an orchard-dairy area of Wisconsin. 481
- Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486
- A consideration of insecticide effects on hypothetical avian populations. 499
- Household insecticides. 503
- The situation regarding the use of aldrin and dieldrin in Europe. 504
- Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512

SUBJECT INDEX

LARVAE

- Insect resistant thermoplastic compositions.
Patent 3,408,323. 556
- The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562
- O,o-diisopropyl-ethylsulfynlmethyl-dithiophosphate. Patent 3,408,426. 569
- For safer ULV spraying. 571
- INSECTS**
- Secrets of the insects. 2
- Preliminary report on the distribution in Switzerland of *Boreus hiemalis* L. and *Boreus westwoodi* Hag (Mecoptera, Boreidae). 23
- Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68
- Mite chromosomes; an exceptionally small number. 183
- Citrus culture. 202
- Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue. 453
- Insect resistant thermoplastic compositions.
Patent 3,408,323. 556
- INSPECTION (AGRICULTURAL PRODUCTS)**
- Plant inspection and what it entails. 258
- INSULIN**
- The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130
- INTEGRATED CONTROL (INSECTS)**
- Controlling the Mexican bean beetle. 56
- The factors determining the efficacy of biological preparations in plant protection. 229
- INTEGRATED CONTROL (WEEDS)**
- Invasion of grassland by *Baccharis pilularis* DC. 314
- INTERNATIONAL COOPERATION**
- Diagnosis: A central pillar of insect pathology. 162
- INTERSTATE COMMERCE**
- Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338
- INTESTINES**
- The effect of mucin on the amino acid absorption in the rat intestine. 203
- Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats. 427
- Agricultural control measures against intestinal parasites in cattle. 446
- IODINE**
- On the occurrence and treatment of actinobacillosis in cattle. 235
- IONS**
- Osmotic and ionic regulation in insects. 152
- Determination of fluorine in feeds by the fluoride ion activity electrode. 567
- IOXYNIL**
- Inhibition of photosynthetic electron transport by ioxynil. 521
- IRON**
- The status of some micronutrients in healthy *Robusta* banana plants. 544
- IRRADIATION**
- Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.). 86
- Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation. 407
- Effect of gibberellic acid on gamma irradiated barley seeds. 531
- Peroxidase isozymes in barley leaves from irradiated seeds. 554
- ISOMERISM**
- Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249
- ISOPRENIDS**
- Lipid metabolism and function in insects. 92
- IXODES HOLOCYCLUS**
- Scrub tick paralysis in farm animals. 333
- IXODIDES**
- Tick fever in poultry. 415
- Tick-borne diseases of cattle in Trinidad. 438
- JUNIPERUS**
- Container growing. Chapter 22: Insects and diseases. 206
- KEEL CYSTS**
- Breast blisters in turkeys. 402
- KIDNEY BEANS**
- The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
- KIDNEYS**
- Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus. 375
- Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385
- KINETICS**
- A serological inquiry about brucellosis in Toulouse veterinary students. 363
- Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565
- LABORATORIES**
- Diagnosis: A central pillar of insect pathology. 162
- LABORATORY ANIMALS**
- Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants. 347
- Comparative study of the pathogenic and immunogenic power of a new acapsulogenic strain of *Bacillus anthracis* (Ihtiman strain). 418
- LAC**
- Effect of superparasitism on the development, sex ratio and progeny of *Bracon greeni* Ashmead. 139
- LACTONES**
- On the antibioticly active substances of the tulip (*Tulipa gesneriana*). 543
- LAGENERIA SICERARIA**
- Note on *Sphenarches anisodactylus*, Wkr. damaging bottle gourd (*Lageneria lucantha*, Rusby). 285
- LANJAN VIRUS**
- Lanjan virus, a new agent isolated from *Dermacentor auratus* in Malaya. 437
- LARVAE**
- Resistance to cold in *Ceratonia catalpae*. 1
- Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64
- The fate of immature housefly populations at low and high densities. 66
- Environmental humidity and the susceptibility of larvae of *Anagasta kuhniella* Zell. to *Bacillus thuringiensis* Berliner. 91
- The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
- Tests on standardization of *Bacillus thuringiensis* preparations. 100
- Some remarks on the *Hydrophilia* disease of the larvae of *Melolontha melolontha* C.(Col. Scarabaeidae). 105
- A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L. 107
- Larval movement of *Lasioderma serricorne* (F.) (Coleoptera: Anobiidae) in a plane. 116
- Complement to the study of the larval biology of *Sympticus costatus* Loew (Diptera: Nemestrinidae), a grasshopper parasite, and general considerations on the biology of Nemestrinidae. 118
- Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae). 123
- Can one reconcile the control of San Jose scale (*Quadraspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.). 125
- Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia pomonella* L.). 142
- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145
- Computing a population budget from sequentially sacrificed, replicated cultures. 156
- Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae). 160
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- Infectiousness of coccidians for insects. 174
- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175
- Timber. *Tetrameles nudiflora* R., resistant to teredid borers in Bombay harbour. 198

SUBJECT INDEX

LARYNGOTRACHEITIS

- Biology of the spiny bollworm. 278

LARYNGOTRACHEITIS

- Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR. 343

LASIODERMA SERRICORNE

- Larval movement of *Lasioderma serricorne* (F.) (Coleoptera: Anobiidae) in a plane. 116

LAWNS

- Weed control for the home garden. 306

LEAF DROP (LETTUCE)

- Control of lettuce leaf drop by soil drenching with fungicides. 253

LEAF ROLL

- The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292

LEAF RUST (WHEAT)

- Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236

LEAVES

- The boron status of deciduous fruit as reflected by leaf and fruit composition. 221

- Coralloid root systems in plants showing lime induced chlorosis. 234

- Directional growth of the urediospore germ tubes and stomatal penetration. 242

- Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260

- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocybidae) grown on apple trees. 268

- External and internal symptomatology on *Vitis* from plant sucking insects. 290

- Chemical weed control. 301

- Inhibition of photosynthetic electron transport by ioxynil. 521

- Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522

- The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527

- Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth. 540

- Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.). 542

- Peroxidase isozymes in barley leaves from irradiated seeds. 554

LEGISLATION

- Official register of plant protection preparations and equipment 1968. 189

- Official register of plant protection preparations and equipment 1967. 190

- Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338

- Two sides to the vaccine picture. 345

- Notice of filing of petition for food additives decoquinate and procaine penicillin. 379

- Pollution costs money. 465

- Defense possibilities of society against pollution of food and environment. 466

- Objectives and role of the water pollution control administration on water quality standards. 467

- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475

- Establishment of tolerances for pesticide residues. 493

- The situation regarding the use of aldrin and dieldrin in Europe. 504

- Permissive chemical. 568

LEGUMES

- A field trial with phenoxybutyric herbicides on tropical forage legumes. 308

LEPIDOPTERA

- Contribution to the knowledge of the lepidoptera fauna of Iran. 8

- Notes on the fauna of the Armoricaire Mountains. 21

- Insect hunt by artificial light in the region of Charleroi in 1966. 29

- Hunting at night at Losheimergraben. 37

- A good region: Barvaux s/Ourthe. 38

- New species for the Belgian fauna. 39

- Iconography of the eggs of the Lepidoptera fauna of Belgium. 47

- Forest insects. 57

- Long or tactile setae and the microscopic or proprioceptor setae in an hypothetical segment of Lepidoptera. 81

- Multiple parasitism in *Diparopsis watersi* Roths. (Lep. Agrotidae). 90

- Butterflies, collecting and rearing. 93

- Iconography of the eggs of the Lepidoptera fauna of Belgium. 147

- Iconography of the eggs of the Lepidoptera fauna of Belgium. 148

- Cultures of insect tissues with the aid of mammalian serum. 168

- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175

- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephestia*) *kuehniella* Zeller (Lepidoptera). 177

- An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae. 286

LEPTINOTARSA DECEMLINEATA

- Observations and studies on extomophagous fungi in Hungary. 165

LEPTOSPIRA CANICOLA

- Endotoxin properties of *Leptospira canicola*. 359

LESTES EURINUS

- Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae). 123

LETHAL FACTOR

- Safe use of pesticides. 506

LETTUCE

- Control of lettuce leaf drop by soil drenching with fungicides. 253

LEUKOCYTES

- Control by ovarian status of induced leukocytic responses in the sheep uterus. 346

LIGHT

- Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae). 123

- How to produce high yields. 194

LIGHT TRAPS

- Insect hunt by artificial light in the region of Charleroi in 1966. 29

- The effect of bioclimate on the communication system of night-flying moths. 170

LIME

- Coralloid root systems in plants showing lime induced chlorosis. 234

- Manganese toxicity in tomato seedlings. 518

LIMNOLOGY

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton. 204

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) IV. Benthos. 335

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton. 336

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) V. Abiotic environment. 559

LINARIA DALMATICA

- Control of Dalmatian toadflax. 320

LINDANE

- Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249

- The use of gas chromatography in detecting lindane in sewage effluent. 483

- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494

LIPIDS

- The defense mechanism of the cuticle of the sunn pest (*Eurygaster integriceps* Put.) against plant microorganisms. 83

- Lipid metabolism and function in insects. 92

- Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig. 370

LIPOPOLYSACCHARIDES

- Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396

LISTERIA MONOCYTOGENES

- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344

SUBJECT INDEX

MANAGEMENT

LIVER
Anthemintic effect of salicylanilide preparation on common liver flukes. 449

LIVER DISEASES
The life span of *Fasciola hepatica* in cattle. 448

LIVESTOCK
Scrub tick paralysis in farm animals. 333
Heredity and disease in domestic animals. 394
Get rid of grubs in a hurry. 435
Effect of agriculture on nitrate pollution of groundwater. 469
Crop and livestock depredation reduced by wildlife services damage control programs. 579

LIVESTOCK DISEASES
Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338

Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*. 340
Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with 10 and 25 milligrams of saponine per dose. 341

Two sides to the vaccine picture. 345

A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348

Drugs: How do you use them. 350

Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351

Erysipelas--our costliest pig disease. 352

Studies on acute Marek's disease. VI. Body temperature of infected chickens. 354

Preliminary study of an enterovirus isolated from a balanoposthite lesion of cattle. 357

Airsacculitis relation to mycoplasmas in turkeys free of *Mycoplasma gallisepticum*. 360

Some effects of route of administration and dilution on the toxicity of carbon tetrachloride drenches for sheep. 361

Research note: Observations on immune factors associated with arizona group infections in turkeys. 364

The eradication of bovine tuberculosis and brucellosis. 368

Brucella ovis infection. 373

Cholera eradication progress report. 374

Studies on the epidemiology of vesicular stomatitis virus. 376

Card brucellosis test... swine. 382

Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385

Isolation and characterization of a porcine enterovirus. 386

Tuberculosis in the pig and the tuberculin test. 388

The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389

Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396

Report of the committee on nomenclature and reporting of disease, Northwestern Conference on Avian Diseases, June 1968. 400

The use of *Brucella* whey complement fixation test in a herd outbreak. 408

Pathogenesis of the round heart syndrome in turkeys. 410

Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate. 412

An outbreak of rabies in swine. 413

Mastitis prevention and control. 416

Disease reports of the Southern Conference on Avian Diseases (SCAD) 1967. 421

Differentiation of mycobacteria isolated from domestic animals. 422

Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429

Pinkeye in cattle. 432

Tick-borne diseases of cattle in Trinidad. 438

Hyostrogylus rubidus: A field study of its pathogenesis, diagnosis and treatment. 440

Diagnosis and treatment of chronic *Salmonella typhimurium* infection in sows. 443

The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447

Studies on vibronic infection of sheep and carion crows. 450

Macrozamia poisoning. 508

Crop and livestock depredation reduced by wildlife services damage control programs. 579

LONGEVITY
Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172

The life span of *Fasciola hepatica* in cattle. 448

LOOSE SMUT
Status of seed treatment for barley smut control. 240

LUCILIA CUPRINA
Melanin in an insect, *Lucilia cuprina* (Wied.). 97

LUNGS
Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351

LUPINUS LUTEUS
Gibberellin A23 in immature seeds of *Lupinus luteus*. 199

LYCAENIDAE
Notes on *Plebeius argyrognomon* Bgstr. (Lepidoptera, Lycaenidae). 54

Biological notes on eye-frequenting moths from North Thailand. 71

LYGAEIDAE
The biology and ecology of the Rhyparochrominae of New England (Heteroptera: Lygaeidae). I. 50

LYMANTRIIDAE
A massive invasion of *Stilpnotia salicis*. (Lymantriidae). 46

LYSINE
The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding. 342

MACROZAMIA
Macrozamia poisoning. 508

MADIA
Effects of 2,4-D on emergence and seedling growth of range grasses. 510

MALARIA
A filterable, proliferating factor simulating autoimmunity in malarious and nonmalarious ducklings. 392

MALATHION
Controlling the Mexican bean beetle. 56

The protection of dried sea-fish from infestation by *Dermestes frischii* Kug. 96

Tick fever in poultry. 415

The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract). 566

MALEIC ACID
Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565

MALIPIGHAMOEBA MELLIFICAE
The measurement and interrelationships of infections with *Nosema apis* and *Malipighamoeba mellificae* of honey-bee populations. 59

MALLOPHAGA
Descriptions of new and little known species of Mallophaga (Insecta) from maritime hosts of Chile, South America. 18

MALT
Permissive chemical. 568

MAMAEVIA VYSINEKI
A new species of gall gnat *Mamaevia* n.g.n.sp. (Diptera, Itonididae) from Bohemia. 48

MAMESTRA BRASSICAE
A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159

MAMMALS
Cultures of insect tissues with the aid of mammalian serum. 168

MAMMARY GLANDS
Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337

Mastitis prevention and control. 416

MANAGEMENT
Pest control, education, and the New Breed. 577

SUBJECT INDEX

MANGANESE

MANGANESE

Manganous oxide (MnO) as a fertilizer for controlling manganese deficiency in oats. 257

Manganese toxicity in tomato seedlings. 518

The status of some micronutrients in healthy Robusta banana plants. 544

MANGANESE CHLORIDE

Marking insects with dietary manganese for detection by neutron activation. 41

MANGANESE OXIDES

Manganous oxide (MnO) as a fertilizer for controlling manganese deficiency in oats. 257

MANSONIA UNIFORMIS

Biting cycles and parity of the mosquito *Mansonia* (*Mansonioides*) *uniformis* (Theo.) in Ceylon. 146

MANUALS

Guide to the analysis of pesticide residues. 546

MARINE BORERS

Timber. *Tetrameles nudiflora* R., resistant to teredid borers in Bombay harbour. 198

MARKETING

Molded from wood fibers, new family of products for variety of markets. 572

MARKETING RESEARCH

Recipe for modern handling. 575

MASTITIS

Swine mastitis-metritis agalactia syndrone. 369

The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389

Mastitis prevention and control. 416

MATHEMATICS

A mathematical model for two *Tribolium* populations in competition. 164

MAYETIOLA DESTRUCTOR

The Hessian fly. 281

MEASUREMENT

The measurement and interrelationships of infections with *Nosema apis* and *Malipighamocba mellificae* of honey-bee populations. 59

Fluorodensitometric measurement of aflatoxin thin layer chromatograms. 451

MEAT

Official FDA tolerances. 482

The toxicity of fly ash for cattle. 507

MEDICAL ENTOMOLOGY

Medical parasitology and exotic pathology. 185

Problems of public health and medical entomology. 186

MEGASELIA SCALARIS

Infestation of emulsion paint by the fly *Megaselia scalaris* (Loew) (Dipt., Phoridae). 126

MELANINS

Melanin in an insect, *Lucilia cuprina* (Wied.). 97

MELOIDOGYNE

Relative efficacy of different oil-cakes on the incidence of root-knot nematodes. 298

MELOLONTHA MELOLONTHA

Developmental cycle and pathology of a microsporidiosis brought about by *Nosema melolonthae* (Krieg) comb. nov. in grubs of *Melolontha melolontha* (L.) (Col. Melolonthidae). 104

Some remarks on the *Hydrophilia* disease of the larvae of *Melolontha melolontha* C.(Col. Scarabaeidae). 105

Electron microscopic study of the intracellular rickettsia pathogenesis using *Melolontha melolontha* L. 169

MERCURY COMPOUNDS

Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565

METABOLISM

The biochemistry of the insect fat body. 110

The change in voltinism in *Bombyx mori* L., by injection of either adrenalin or insulin. (Preliminary note). 130

Urinary conversion products of injected progesterone-4-14-C in the domestic fowl. 332

METABOLITES

Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249

METALS

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444. 442

METAMORPHOSIS

Pre-gravid phase of ovarian development in *Aedes detritus* haliday. 151

METHIONINE

The effectiveness of mixed feed enriched with lysine and methionine when applied for calf breeding. 342

METHODOLOGY

The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67

A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L. 107

The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292

Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others. 470

Colorimetric method for the determination of Dichlorovos(DDVP). 561

Farmers' expenditures for custom pesticide service in 1964. 574

METHOXYCHLOR

Controlling the Mexican bean beetle. 56

The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562

METHYL BROMIDE

Verticillium wilt in the tomato cultures of the Valais. 231

METHYL PARATHION

Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487

METHYL-4-CHLOROPHENOXY)BUTYRIC ACID, 4-(2-

A field trial with phenoxybutyric herbicides on tropical forage legumes. 308

A comparison of post-emergence herbicides in young lucerne. 324

METHYLENE BLUE

The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344

METHYLENEBIS(3,4,6-TRICHLOROPHENOL), 2,2'

Process for preparing bis-(3,5,6-trichloro-2-hydroxyphenyl) methane. Patent 3,408,408. 553

METRITIS

Swine mastitis-metritis agalactia syndrone. 369

MICE

Modifications of the natural resistance to infection of mice treated by several histone fractions. 403

A new type in experimental intraperitoneal infection of staphylococci in mice. 414

Isolation of rabies virus from fruit bats in Thailand. 419

MICROBIOLOGY

The use of micro-organisms for the control of insect pests. 136

How fungi infect stored grains. 261

Concentration of certain myxoviruses with polyethylene glycol. 378

Collaborative study of a quantitative method for *Clostridium perfringens* in foods. 455

False-positive coagulase reactions in the characterization of microorganisms isolated from foods. 457

Solid state fluorescence emission of aflatoxins on silica gel. 460

The culture of *Phytophthora infestans* on fully synthetic culture medium substrata. 525

Collaborative study of microbiological assay of oxytetracycline in feeds. 545

MICROCLIMATE

Insect mycology: Glimpses and perspectives. 131

MICRONUTRIENTS

Marking insects with dietary manganese for detection by neutron activation. 41

Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522

Studies on wheat plants using 14C-labelled compounds. XXII. Incorporation into wheat protein. 536

The status of some micronutrients in healthy Robusta banana plants. 544

MICROORGANISMS

The use of micro-organisms for the control of insect pests. 136

Application of beta-propiolactone on the rearing of the silkworm, *Bombyx mori* L. 167

Control of race 2 *Fusarium* of tomatoes. 237

Dieback. 251

Breast blisters in turkeys. 402

SUBJECT INDEX

MYCOBACTERIUM BOVIS

- Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats. 427
- MICROSCOPY**
A method for counting bacterial cells in the midgut of the silkworm larvae, *Bombyx mori* L. 107
The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292
Tick fever in poultry. 415
Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage. 526
- MICROSPORIDIA**
New facts concerning the extrusion of microsporidian spores. 122
- MILK**
Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337
A selective-differential medium for detection of *Streptococcus agalactiae*. 367
Analysis for aflatoxin M in milk. 458
Dieldrin residue in an orchard-dairy area of Wisconsin. 481
The toxicity of fly ash for cattle. 507
- MILK ANALYSIS**
The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389
The use of *Brucella* whey complement fixation test in a herd outbreak. 408
Mastitis prevention and control. 416
Dieldrin residue in an orchard-dairy area of Wisconsin. 481
- MILK FAT**
DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT pills and DDTsuperphosphate. (abstract). 477
Effect of various physical treatments on certain organochlorine hydrocarbon insecticides found in milk fat. 480
- MILKY DISEASE**
The present status of milky disease of Japanese beetle in Connecticut. 62
Cytology of milky disease bacteria. II. Morphogenesis of *Bacillus popilliae* in vitro. 63
Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64
- MILLET**
Germination biology and the fight against the chickenmillet. 331
- MINERAL OIL**
Use of petroleum oils and herbicide mixtures to improve weed control performance. 303
Atrazine in oil in South Dakota. 323
- MINERALS**
Nutrient requirements of poultry. 397
Nutrient requirements of dairy cattle. 398
- Nutrient requirements of horses. 399
- MINKS**
Studies on prevention of mink-distemper. 401
Prevention, diagnosis and treatment of disease. 409
- MITES**
Observations on the reproduction of *Hemitarsonemus latus* (Banks) (Acarina Tarsonemidae). 137
Mite chromosomes; an exceptionally small number. 183
Citrus culture. 202
Old and new Acaridae, citrus plant parasites in Italy. 274
Control of insect and mite pests of small fruits. 283
Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284
- MITOCHONDRIA**
Metabolic control mechanisms in insects. 98
- MODELS**
A mathematical model for two *Tribolium* populations in competition. 164
- MOLTING (INSECTS)**
Synthesis of rubrosterone, a metabolite of insect-moulting substances from *Achyranthes rubrofusca*. 102
- MONILIASIS**
Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis. 355
- MONILINIA FRUCTICOLA**
Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches. 233
- MONODONTOMERUS GLADIATUS**
New species of palearctic Torymidac (Hym. Torymidac). 49
- MORPHOLOGY**
Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64
Mite chromosomes; an exceptionally small number. 183
- MORTALITY**
The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67
Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68
Environmental humidity and the susceptibility of larvae of *Anagasta kuhniella* Zell. to *Bacillus thuringiensis* Berliner. 91
Tests on standardization of *Bacillus thuringiensis* preparations. 100
Side effects of *Bacillus thuringiensis*. The effects on bees (*Apis mellifera* L.). 112
Laboratory tests of *Bacillus thuringiensis* Berliner preparations against larvae of *Carpocapsa* (*Laspeyresia pomonella* L.). 142
Considerations on the toxic and labile substance produced by *Bacillus thuringiensis* var. *thuringiensis* Berliner (labile exotoxin). 154
A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia ni*. 158
- Comparative susceptibility of lepidopterous larvae to *Bacillus thuringiensis* Berliner. 175
Experimental bluetongue disease in white-tailed deer. Abstract. 428
A consideration of insecticide effects on hypothetical avian populations. 499
Dieldrin effects in two generations of penned hen pheasants. 502
- MOSAIC**
Partial purification of sugarcane mosaic virus by filtration through gel. 219
Plant inspection and what it entails. 258
- MOTHS**
The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
The effect of bioclimate on the communication system of night-flying moths. 170
Ultrasound to stop the moths settling. 265
- MUCINS**
The effect of mucin on the amino acid absorption in the rat intestine. 203
- MUSCA DOMESTICA**
Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4
The fate of immature housefly populations at low and high densities. 66
The fate of spores of *Nosema apis* Zander ingested by muscoid flies. 111
Computing a population budget from sequentially sacrificed, replicated cultures. 156
Lindane: Metabolism to a new isomer of pentachlorocyclohexene. 249
- MUSCIDAE**
A new Japanese species of *Atherigona* Rond. (Diptera: Muscidae) reared from sugar-cane. 44
- MUSCLES**
Functional aspects of the organization of the insect nervous system. 155
- MUSHROOMS**
Mycological strolls. 200
Aphelenchoides bicaudatus, a parasite of cultivated mushroom. 299
- MUTATION**
Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.). 86
Melanin in an insect, *Lucilia cuprina* (Wied.). 97
Genetic study of a mutation modifying the sensitivity of a lambda phage to immunity. 184
- MYCOBACTERIUM**
Differentiation of mycobacteria isolated from domestic animals. 422
- MYCOBACTERIUM AVIUM**
Tuberculosis in the pig and the tuberculin test. 388
- MYCOBACTERIUM BOVIS**
Tuberculosis in the pig and the tuberculin test. 388

SUBJECT INDEX

MYCOBACTERIUM TUBERCULOSIS

MYCOBACTERIUM TUBERCULOSIS

Tuberculosis in the pig and the tuberculin test. 388

MYCOLOGY

Mycological strolls. 200

MYCOPLASMA

Airsacculitis relation to mycoplasmas in turkeys free of *Mycoplasma gallisepticum*. 360

MYCOPLASMA GALLISEPTICUM

Airsacculitis relation to mycoplasmas in turkeys free of *Mycoplasma gallisepticum*. 360

Penetration patterns of *Mycoplasma gallisepticum* and Newcastle disease virus through the outer structures of chicken eggs. 433

MYXOVIRUSES

Concentration of certain myxoviruses with polyethylene glycol. 378

MYZUS PERSICAE

Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L.) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172

Tests with insecticides for the control of resistant *Myzus persicae* (Sulzer) on year-round chrysanthemums. 277

NEMATOCIDES

The effective breadth and action of temik. (Experiences from Germany). 135

Nematodes can be controlled. 294

NEMATODES

Protozoan and nematode infections of insects. 173

Eelworm in tea: Some important groups. 296

The increased attack of *Ditylenchus dipsaci* on onion caused by some fungicides. 297

Aphelenchoides bicaudatus, a parasite of cultivated mushroom. 299

Nematodes of the Northern Great Plains. 300

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406

Agricultural control measures against intestinal parasites in cattle. 446

The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447

NEMESTRINIDAE

Complement to the study of the larval biology of *Symptetis costatus* Loew (Diptera: Nemeritridae), a grasshopper parasite, and general considerations on the biology of Nemeritridae. 118

NEMOURIDAE

The Nemouridae of Assam (Plecoptera). 7

NEOBACILLAPHIS SZELEGIEWICZI

A new genus and four new species of Aphids (Homoptera, Aphididae) from Poland. 103

NEOPLASMS

Equine ovarian granulosa tumours. 372

Tonsillar carcinoma in rural dogs. 405

The history of investigation of tumors in animals. 430

NEPHOTETTIX APICALIS

Hybrids of *Nephotettix impicticeps* Ish. and *N. apicalis* (Motsch.) and their ability to transmit the tungro virus to rice. 119

NEPHOTETTIX IMPICTICEPS

Hybrids of *Nephotettix impicticeps* Ish. and *N. apicalis* (Motsch.) and their ability to transmit the tungro virus to rice. 119

NERVES

The properties of insect axons. 132

Neural lesions in the offspring of female rats fed a copperdeficient diet. 349

NERVOUS SYSTEM

Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61

Functional aspects of the organization of the insect nervous system. 155

NEUTRONS

Marking insects with dietary manganese for detection by neutron activation. 41

NEWCASTLE DISEASE VACCINES

Two sides to the vaccine picture. 345

NEWCASTLE DISEASE VIRUS

Penetration patterns of *Mycoplasma gallisepticum* and Newcastle disease virus through the outer structures of chicken eggs. 433

NICKEL

Problems of fungicidal efficiency. 255

NITRATES

Effect of agriculture on nitrate pollution of groundwater. 469

NITRIFICATION

The effect of temperature and fumigation on the nitrification rate in soil. 215

NITROBENZOHYDROXAMIC ACID, P

Chemical control of pigweed. Patent 3,408,176. 315

NITROGEN

The excretion of nitrogen in insects. 69

Tempting the soybean's erratic appetite. 228

Are fertilizers creating pollution problems. 468

Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524

Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533

Influence of some aminotriazine herbicides on some soil fungi. 537

NOCTUIDAE

Sometimes old collections contain surprises. (Noctuidae). 10

Listing of the tritid Noctuidae of France and Belgium. 16

Notes on the fauna of the Armoricaine Mountains. 20

New species for the Belgian fauna. 35

Apamea pabulatricula Brahm in Belgium. (Noctuidae). 36

Biological notes on eye-frequenting moths from North Thailand. 71

NOMENCLATURE

Original descriptions, synonyms and geographical distribution of the species of the Syrphidae (Diptera) family in Chile. 24

The nomenclature problem of *Trichogramma* species. 45

Notes on *Plebeius argyrognomon* Bgstr. (Lepidoptera, Lycaenidae). 54

The control of polymorphism in aphids. 115

Report of the committee on nomenclature and reporting of disease, Northwestern Conference on Avian Diseases, June 1968. 400

Pest control, education, and the New Breed. 577

NOSEMA

A new *Nosema* sp. of *Euproctis chrysorrhoea* L. 120

NOSEMA APIS

The measurement and interrelationships of infections with *Nosema apis* and *Malpighamoeba mellificae* of honey-bee populations. 59

The fate of spores of *Nosema apis* Zander ingested by muscoid flies. 111

The occurrence of a *Crithidia* species within the gut of the honey bee, *Apis mellifica* L. 121

NOSEMA DISEASE

The measurement and interrelationships of infections with *Nosema apis* and *Malpighamoeba mellificae* of honey-bee populations. 59

The occurrence of a *Crithidia* species within the gut of the honey bee, *Apis mellifica* L. 121

NOSEMA MELOLONTHAE

Developmental cycle and pathology of a microsporidiosis brought about by *Nosema melolonthae* (Krieg) comb. nov. in grubs of *Melolontha melolontha* (L.) (Col. Melolonthidae). 104

NOTONECTIDAE

Notonecta borealis Bucno and Hussey (Hem., Notonectidae): A flightless species. 150

NOZZLES

Concentrate spraying. 570

NURSERIES

How to produce high yields. 194

Plant inspection and what it entails. 258

Chemical aids figure in plant propagators' reports. 516

NUTRIENT SOLUTIONS (PLANTS)

Tempting the soybean's erratic appetite. 228

NUTRITION

Feeding behavior and nutrition in grasshoppers and locusts. 75

Are fertilizers creating pollution problems. 468

Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478

NYGMIA PHAEORRHOEA

A new *Nosema* sp. of *Euproctis chrysorrhoea* L. 120

SUBJECT INDEX

PARASITIC INSECTS

NYMPHALIDAE

A deviant form of *Aglais urticae*. (Nymphalidae).

33

A new sub-species of *Cynandra opis* Drury.

34

OATS

Oat diseases and their control.

256

Manganous oxide (MnO) as a fertilizer for controlling manganese deficiency in oats.

257

Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder.

260

Effect of atrazine on oats (*Avena sativa* var. Minhafer) I and II. (abstract).

490

OCCUPATIONAL DISEASES

Medical observations concerning ornithosis control in the poultry industry.

365

ODONATA

Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae).

123

OESOPHAGOSTOMUM

Hyostongylus rubidus: A field study of its pathogenesis, diagnosis and treatment.

440

OIDIUM

Recommendations for chemical treatment of diseases of Hevea.

250

OIL MEAL

Relative efficacy of different oil-cakes on the incidence of root-knot nematodes.

298

OILS

Pesticide residues in ointment bases of natural origin.

496

OLEIC ACID

Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats.

427

OLIVES

The olive fly, *Dacus oleae* Gmel. and its parasites in Corsica, in 1959 and 1960.

84

ONIONS

The increased attack of *Ditylenchus dipsaci* on onion caused by some fungicides.

297

ONYCHIURIDAE

A defense mechanism in *Onychiurus* (Collembola, Onychiuridae).

166

OOGENESIS

Pre-gravid phase of ovarian development in *Aedes detritus* haliday.

151

ORCHARDS

Tree line weed control in Goulburn Valley orchards.

325

Dieldrin residue in an orchard-dairy area of Wisconsin.

481

Crop and livestock depredation reduced by wildlife services damage control programs.

579

OREOPSYCHE

Materials for a revision of the genus *Oreopsyche* (Psychidae).

14

Materials for a revision of the genus *Oreopsyche* (Psychidae).

15

ORGANIC COMPOUNDS

Determination of arsenic in organic arsonates.

474

Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography.

491

ORGANOPHOSPHORUS COMPOUNDS

Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate.

485

Pesticide residues in ointment bases of natural origin.

496

ORGANOTIN COMPOUNDS

The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view.

509

ORGYIA ANTIQUA

The biology of *Orgyia antiqua* (Linnaeus). (Lepidoptera).

82

ORNAMENTAL PLANTS

Weed control for the home garden.

306

ORNITHOSIS

Medical observations concerning ornithosis control in the poultry industry.

365

ORYZOXMYCIN

Oryzoxymycin, a new antibiotic.

371

OSCINELLA FRIT

The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.).

288

OSMOSIS

Osmotic and ionic regulation in insects.

152

OSTERTAGIA OSTERTAGI

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis.

406

OSTERTAGIASIS

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis.

406

OSTRINIA NUBILALIS

Methods concerning the determination of the effectiveness of insecticides against the European corn borer (*Ostrinia* (*Pyrausta*) *nubilalis* Hbn.) with small control tests and aerial chemical applications.

227

OULEMA MELANOPUS

Current status of cereal leaf beetle control efforts.

287

OVARIAN CYSTS

Equine ovarian granulosa tumours.

372

OVARIES

Pre-gravid phase of ovarian development in *Aedes detritus* haliday.

151

Control by ovarian status of induced leukocytic responses in the sheep uterus.

346

OXIDATION

The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract).

566

OXYGEN

Inhibition of photosynthetic electron transport by ioxynil.

521

Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide.

523

OXYTETRACYCLINE

Collaborative study of microbiological assay of oxytetracycline in feeds.

545

Process for producing oxytetracycline antibiotic. Patent 3,408,258.

555

OZONE

The effect of bioclimate on the communication system of night-flying moths.

170

PAINTS

Infestation of emulsion paint by the fly *Megaselia scalaris* (Loew) (Dipt., Phoridae).

126

PALEARCTIC REGION

New species of palearctic Tormyidae (Hym. Tormyidae).

49

PANONYCHUS ULMI

Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch).

267

PANSTRONGYLUS GENICULATUS

Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae).

9

PAPER CONTAINERS

Fly and economic evaluation of urban refuse systems. Part II. AN efficiency analysis of paper bag containers.

452

PAPILIONIDAE

Notes on the classification of the Iberian families of *Parnassius apollo* (Papilionidae).

17

Iconography of the eggs of the Lepidoptera fauna of Belgium.

47

PARACLYSTIS

African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae).

28

PARACOLOBACTRUM ARIZONAE

Research note: Observations on immune factors associated with arizona group infections in turkeys.

364

PARAINFLUENZA-3

Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*.

340

PARALYSIS

Scrub tick paralysis in farm animals.

333

Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967.

339

Anti-rabies vaccinations at the Montpellier Center in 1967.

383

Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967.

384

Anti-rabies vaccinations at the Marseille Pasteur Center in 1967.

417

PARAQUAT

A minimum cultivation trial with maize using paraquat herbicide.

309

Tree line weed control in Goulburn Valley orchards.

325

Collaborative study of a colorimetric method for paraquat in formulations.

550

PARASITES

Medical parasitology and exotic pathology.

185

PARASITIC INSECTS

Descriptions of new and little known species of Mallophaga (Insecta) from maritime hosts of Chile, South America.

18

SUBJECT INDEX

PARASITIC NEMATODES

Complement to the study of the larval biology of *Sympteticus costatus* Loew (Diptera Nemes-trinidae), a grasshopper parasite, and general considerations on the biology of Nemes-trinidae. 118

Bionomics and ecology of *Ephedrus pulchellus* Stelfox an important parasite of leaf-curling aphids in Czechoslovakia with notes on the diapause (Hym. Aphididae). 160

Note on *Sphenarches anisodactylus*, Wkr. damaging bottle gourd (*Lagenaria lucantha*, Rusby). 285

Lanjan virus, a new agent isolated from *Dermacentor auratus* in Malaya. 437

PARASITIC NEMATODES

Diagnostic station near Dunedin is New Zealand's watchdog against disease. 441

PARASITISM

Biological notes on eye-frequenting moths from North Thailand. 71

The olive fly, *Dacus oleae* Gmel. and its parasites in Corsica, in 1959 and 1960. 84

Palaearctic encyrtids parasites of psyllids. 85

Multiple parasitism in *Diparopsis watersi* Roths. (Lep. Agrotidae). 90

Fly enemies...your allies. 117

The principal parasites observed on the leaf roller moths of Spain with particular attention to *Lymantria dispar* L. 143

A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159

Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* L.) by means of egg parasites of the genus *Trichogramma*. 161

Protozoan and nematode infections of insects. 173

Variation in the host-parasite relationship of a crop disease. 218

Didymella bryoniae, a new fungus parasite of cucumber cultures. 232

The need for conserving natural enemies of pests. 270

Aphelenchoides bicaudatus, a parasite of cultivated mushroom. 299

Strain variation in the response of *Haemonchus contortus* in sheep and goats given phenothiazine: Efficacy of N.F. and purified products on pure parasitic infections. 439

Hyostrogylus rubidus: A field study of its pathogenesis, diagnosis and treatment. 440

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444. 442

Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444

Gains from worm drenching ewe hoggets in South Canterbury. 445

Agricultural control measures against intestinal parasites in cattle. 446

The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447

The life span of *Fasciola hepatica* in cattle. 448

PARASITOLOGY

Medical parasitology and exotic pathology. 185

PARATHION

Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442. 78

Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79

Can one reconcile the control of San Jose scale (*Quadraspidiotus perniciosus* Comst.) with the fight against the carpocapsa (*Carpocapsa pomonella* L.). 125

A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291

Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487

Parathion residue in cured alfalfa. 495

Reduction of parathion residue on celery. 497

PARNASSIUS APOLLO

Notes on the classification of the Iberian families of *Parnassius apollo* (Papilionidae). 17

PARTICLE SIZE DETERMINATION

Concentrate spraying. 570

PARTURITION

Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337

PASTEURELLA HAEMOLYTICA

Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*. 340

PASTEURIZATION

Heat pasteurization and chemical fungicides for control of Fusarium rot of California cantaloupes. 263

PASTURES

Chemical control of weeds in fields and in the open country. 302

Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406

DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT pills and DDTsuperphosphate. (abstract). 477

PATENTS

Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442. 78

Chemical control of pigweed. Patent 3,408,176. 315

Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444. 442

Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444

Monoethers of 2,2'-dihydroxydiphenyl sulfone and method of making the sulfone and monoethers. Patent 3,408,402. 547

Carotenoid compounds. Patent 3,408,406. 552

Process for preparing bis-(3,5,6-trichloro-2-hydroxyphenyl) methane. Patent 3,408,408. 553

Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555

Insect resistant thermoplastic compositions. Patent 3,408,323. 556

O,o-diisopropyl-ethylsulfynylmethyl-dithiophosphate. Patent 3,408,426. 569

PEACHES

Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches. 233

Study of the interaction of growth retardants and a virus on the growth of *Prunus persica* line GF 305. 535

PEANUTS

Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522

PEARS

Fireblight: A disease we don't want. 230

PECTINOPHORA GOSSYPIELLA

Effects of temperature and water on viability and virulence of *Bacillus thuringiensis* var. thuringiensis Berliner spores. 106

PENICILLIN

Notice of filing of petition for food additives decoquinat and procaine penicillin. 379

Tick fever in poultry. 415

Separation of penicillins by paper and thin layer chromatography. 558

PENICILLIUM RUBRUM

How fungi infect stored grains. 261

PENTACHLOROPHENOL

Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442. 78

PERITONEUM

A new type in experimental intraperitoneal infection of staphylococci in mice. 414

PEROXIDASES

Peroxidase isozymes in barley leaves from irradiated seeds. 554

PEST CONTROL

The use of micro-organisms for the control of insect pests. 136

Forty years of pest control work. 210

Status of seed treatment for barley smut control. 240

Nematodes can be controlled. 294

Eelworms in tea: Some problems. 295

Get rid of grubs in a hurry. 435

Fly and economic evaluation of urban refuse systems. Part II. AN efficiency analysis of paper bag containers. 452

Pest control, education, and the New Breed. 577

PESTICIDE APPLICATION

Recommendations for chemical treatment of diseases of Hevea. 250

SUBJECT INDEX

PLANKTON

- Chemical weed control. 301
- Weed control for the home garden. 306
- Factors influencing the selectivity of herbicides. 500
- Safe use of pesticides. 506
- Farmers' expenditures for custom pesticide service in 1964. 574
- Pest control, education, and the New Breed. 577
- PESTICIDE RESIDUES**
- Pesticides and perspective. 472
- Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475
- Rapid cleanup for carbaryl, using channel layer chromatography. 476
- Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478
- Dieldrin residue in an orchard-dairy area of Wisconsin. 481
- Official FDA tolerances. 482
- Effect of DDT on temperature selection by young atlantic salmon, Salmon solar. (Abstract). 484
- Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486
- Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487
- Isolation and determination of chlorohydrins in foods fumigated with ethylene oxide or with propylene oxide. 489
- Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography. 491
- Establishment of tolerances for pesticide residues. 493
- Improved GLC method for s-triazine residue determination. 498
- Factors influencing the selectivity of herbicides. 500
- Guide to the analysis of pesticide residues. 546
- Monitoring the environment. 548
- PESTICIDES**
- Official register of plant protection preparations and equipment 1968. 189
- Official register of plant protection preparations and equipment 1967. 190
- An appraisal of high medium and low volume methods of spray application. 192
- Special preparations recognized by the Statens forsogsvirksomhed i Plantekultur for control of plant diseases and pests. 212
- Inhibition of electron transport enzymes and cholinesterases by endrin. (abstract). 353
- Pesticides and perspective. 472
- Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate. 479
- Official FDA tolerances. 482
- Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography. 491
- Potential of toxicology of sumithion by phosphamidon in the rat. (abstract). 505
- Safe use of pesticides. 506
- Chemical aids figure in plant propagators' reports. 516
- Monitoring the environment. 548
- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557
- Collaborative study of gas chromatographic analysis of heptachlor content of formulations. 563
- Pest control, education, and the New Breed. 577
- Federal registration requirements for pesticide products. 578
- PHARMACOLOGY**
- Pharmaceutical guide for veterinarians and students of veterinary medicine. 334
- PHEASANTS**
- Dieldrin effects in two generations of penned hen pheasants. 502
- PHENOTHIAZINE**
- Strain variation in the response of Haemonchus contortus in sheep and goats given phenothiazine: Efficacy of N.F. and purified products on pure parasitic infections. 439
- PHORIDAE**
- Infestation of emulsion paint by the fly Megaselia scalaris (Loew) (Dipt., Phoridae). 126
- PHORMIA REGINA**
- The fate of spores of Nosema apis Zander ingested by muscoid flies. 111
- PHOSPHAMIDON**
- Potential of toxicology of sumithion by phosphamidon in the rat. (abstract). 505
- PHOSPHATES**
- Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444
- PHOSPHORIC ACID ESTERS**
- Can one reconcile the control of San Jose scale (Quadraspidiotus perniciosus Comst.) with the fight against the carpocapsa (Carpocapsa pomonella L.). 125
- PHOSPHORUS**
- Tempting the soybean's erratic appetite. 228
- PHOTOCHEMISTRY**
- Photochemical and exhaust fume damage to plants. 193
- PHOTOPERIODISM**
- Inhibition of flowering in Hyoscyamus niger by 6-azauracil without suppression of stem growth. 540
- PHOTOSYNTHESIS**
- Inhibition of photosynthetic electron transport by ioxynil. 521
- Effects of gibberellin on photosynthesis in red clover (Trifolium pratense L.). 542
- PHYLLXERA VITIFOLIAE**
- Phylloxera: Scourge of the vineyard. 289
- PHYSIOLOGY**
- Dieldrin effects in two generations of penned hen pheasants. 502
- Apparent sap velocities in big sagebrush as related to nearby environment. 573
- PHYTOPHTHORA**
- Recommendations for chemical treatment of diseases of Hevea. 250
- Phytophthora leaf fall and pod rot. 252
- PHYTOPHTHORA INFESTANS**
- The culture of Phytophthora infestans on fully synthetic culture medium substrata. 525
- PICEA**
- Spruce galls in Wisconsin. 241
- PICEA PARRYANA**
- Chemical aids figure in plant propagators' reports. 516
- PICLORAM**
- Control of Dalmatian toadflax. 320
- PIERIS BRASSICAE**
- A study proteolytic enzymes contained in the chyle of Pieris brassicae and of substances active on the crystal of Bacillus thuringiensis. 77
- The role of the intestinal microflora of insects in the disease development brought about by Bac. cereus var. galleriae. 108
- Comparative study of the enzymatic hydrolysis of the crystals of the strains of Bacillus thuringiensis serotype I Berliner and serotype II Anduze. 114
- PIERIS RAPAE**
- Tests on standardization of Bacillus thuringiensis preparations. 100
- PIGMENTS (INSECT)**
- The biochemistry of the insect fat body. 110
- Integumental pigments of the millipede, Polydesmus angustus (Latzel). 133
- PIGWEE**
- Chemical control of pigweed. Patent 3,408,176. 315
- PINEAPPLES**
- The chemical control of weeds in pineapple plantations. 319
- PINUS CARIBAEA**
- Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of Pings caribaea in trinidad. 207
- PIROPLASMOSIS**
- Tick fever in poultry. 415
- Tick-borne diseases of cattle in Trinidad. 438
- PLANKTON**
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton. 204

SUBJECT INDEX

PLANT ABNORMALITIES

- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton. 336

PLANT ABNORMALITIES

- Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth. 540

PLANT ANATOMY

- Short-term growth response to growth regulators in roots of *Zea mays*. 515

PLANT BIOCHEMISTRY

- Shifts in disease resistance induced by growth regulators. 514

- Chemical aids figure in plant propagators' reports. 516

- Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522

- Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536

- Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.). 542

- On the antibiotically active substances of the tulip (*Tulipa gesneriana*). 543

PLANT BREEDING

- Sorghum on the move. 188

- 68th annual report of the Bureau of Sugar Experiment Stations. 191

- Triticale in 1967. 225

- Coffee berry disease. 226

- Plant inspection and what it entails. 258

- Phylloxera: Scourge of the vineyard. 289

- New developments in hybrid barley research. 520

PLANT COMPOSITION

- The boron status of deciduous fruit as reflected by leaf and fruit composition. 221

PLANT CUTTINGS

- Chemical aids figure in plant propagators' reports. 516

PLANT DISEASE CONTROL

- Protection against virus diseases, an essential aspect of maintenance breeding in fruit growing in Czechoslovakia. 223

- Verticillium wilt in the tomato cultures of the Valais. 231

- Control of race 2 *Fusarium* of tomatoes. 237

- Dieback. 251

- Phytophthora leaf fall and pod rot. 252

- Oat diseases and their control. 256

- Plant inspection and what it entails. 258

- The method of testing seed potatoes by mean of the callose (Igcl-Lange) test. 292

PLANT DISEASE RESISTANCE

- Varietal resistance to clover rot in white clover. 217

- Variation in the host-parasite relationship of a crop disease. 218

- Triticale in 1967. 225

- The susceptibility of some cultivated plants to *Sclerotium rolfsii* Sacc. 247

- Shifts in disease resistance induced by growth regulators. 514

- On the antibiotically active substances of the tulip (*Tulipa gesneriana*). 543

PLANT DISEASE TRANSMISSION

- The detection of primary infections of virus diseases in potato plant cultures. 244

PLANT DISEASES

- 68th annual report of the Bureau of Sugar Experiment Stations. 191

- How to produce high yields. 194

- The occurrence of the important causes of damage to cultivated plants in Austria during 1967. 196

- Citrus culture. 202

- Container growing. Chapter 22: Insects and diseases. 206

- Sampling pests and diseases of tea: III. 208

- Pests are endangering our cultivated plants. 211

- Is ergot infection unimportant. 220

- The influence of herbicides on the incidence of disease with particular reference to temperate fruit crops. 238

- Spruce galls in Wisconsin. 241

- Decay of rubber wood in a replanting and its effect on root disease. 245

- Sampling pests and diseases of tea. II. 254

- Plant inspection and what it entails. 258

- Ratoon stunting disease and drought a disastrous combination. 259

- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (Hom., Typhlocybidae) grown on apple trees. 268

PLANT EXTRACTS

- Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography. 491

- Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534

PLANT GALLS

- Concerning some aspects of tissue nourishing gall mites. 129

- Current literature XIX: An annotated bibliography. 201

- Spruce galls in Wisconsin. 241

- Effect of gibberellic acid on gamma irradiated barley seeds. 531

PLANT GENETICS

- Variation in the host-parasite relationship of a crop disease. 218

- New developments in hybrid barley research. 520

- Effect of gibberellic acid on gamma irradiated barley seeds. 531

PLANT GEOGRAPHY

- Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials. 539

PLANT GRAFTING

- Coralloid root systems in plants showing lime induced chlorosis. 234

PLANT GROWTH INHIBITORS

- Short-term growth response to growth regulators in roots of *Zea mays*. 515

- Study of the interaction of growth retardants and a virus on the growth of *Prunus persica* line GF 305. 535

- Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth. 540

PLANT HARDINESS

- Chemical weed control. 301

PLANT HORMONES

- Gibberellin A23 in immature seeds of *Lupinus luteus*. 199

- Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.). 542

PLANT HOSTS

- A massive invasion of *Stilpnolia salicis*. (Lymantriidae). 46

- Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu latiore (Homopt. Aphid.). 127

- A fruit pest is being sterilized. 272

PLANT INJURIES

- Photochemical and exhaust fume damage to plants. 193

- Dieback. 251

- Ratoon stunting disease and drought a disastrous combination. 259

- The Hessian fly. 281

- Phylloxera: Scourge of the vineyard. 289

- External and internal symptomology on *Vitis* from plant sucking insects. 290

- The sugarbeet nematode. Problems and progress in its control in Colorado. 293

- Eelworms in tea: Some problems. 295

- Slugs cause damage in Ohio cornfields. 328

- New developments in hybrid barley research. 520

- Effect of gibberellic acid on gamma irradiated barley seeds. 531

- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541

PLANT METABOLISM

- Coralloid root systems in plants showing lime induced chlorosis. 234

PLANT MORPHOLOGY

- Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524

PLANT NEMATODES

- Pests are endangering our cultivated plants. 211

SUBJECT INDEX

PLANT REGULATORS

- The sugarbeet nematode. Problems and progress in its control in Colorado. 293
- Nematodes can be controlled. 294
- Eelworms in tea: Some problems. 295
- Relative efficacy of different oil-cakes on the incidence. of root-knot nematodes. 298
- PLANT NUTRITION**
- Concerning some aspects of tissue nourishing gall mites. 129
- The boron status of deciduous fruit as reflected by leaf and fruit composition. 221
- Tempting the soybean's erratic appetite. 228
- Manganous oxide (MnO) as a fertilizer for controlling manganese deficiency in oats. 257
- Growth of planted chestnut trees (*Castanea crenata*) in relation to soil nutrients in Korea. 528
- PLANT NUTRITIONAL DEFICIENCIES**
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Oat diseases and their control. 256
- The status of some micronutrients in healthy Robusta banana plants. 544
- PLANT PEST CONTROL**
- Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of *Pings caribaea* in trinidad. 207
- PLANT PEST RESISTANCE**
- Timber. *Tetrameles nudiflora* R., resistant to teredid borers in Bombay harbour. 198
- Phylloxera: Scourge of the vineyard. 289
- PLANT PHYSIOLOGY**
- Container growing. Chapter 22: Insects and diseases 206
- Varietal resistance to clover rot in white clover. 217
- Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236
- Directional growth of the urediospore germ tubes and stomatal penetration. 242
- Physiological races of *Puccinia striiformis* in the wheat of Iran. 246
- Chemical weed control. 301
- Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
- Reduction of parathion residue on celery. 497
- Factors influencing the selectivity of herbicides. 500
- Shifts in disease resistance induced by growth regulators. 514
- Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- Manganese toxicity in tomato seedlings. 518
- Translocation of systemic fungicides. 519
- Effect of boron toxicity on some leaf constituents in groundnut (*Arachis hypogaea*, Linn.) plants. 522
- Morphological changes in wheat caused by the action of chlorthalochloride-CCC. 524
- The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
- Growth of planted chestnut trees (*Castanea crenata*) in relation to soil nutrients in Korea. 528
- Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529
- Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533
- Study of the interaction of growth retardants and a virus on the growth of *Prunus persica* line GF 305. 535
- Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536
- Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
- Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials. 539
- Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth. 540
- The status of some micronutrients in healthy Robusta banana plants. 544
- Peroxidase isozymes in barley leaves from irradiated seeds. 554
- PLANT PROPAGATION**
- Citrus culture. 202
- PLANT PROTECTION**
- Official register of plant protection preparations-and equipment 1968. 189
- Official register of plant protection preparations-and equipment 1967. 190
- An appraisal of high medium and low volume methods of spray application. 192
- Plant protection and the economical position of farming. 195
- Annual plant protection report 1966. 197
- Container growing. Chapter 22: Insects and diseases. 206
- Sampling pests and diseases of tea: III. 208
- Pests are endangering our cultivated plants. 211
- Protection against virus diseases, an essential aspect of maintenance breeding in fruit growing in Czechoslovakia. 223
- The factors determining the efficacy of biological preparations in plant protection. 229
- Fireblight: A disease we don't want. 230
- Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches. 233
- Control of race 2 *Fusarium* of tomatoes. 237
- Problems of fungicidal efficiency. 255
- Ultrasound to stop the moths settling. 265
- Tender trap. (Abstract). 266
- The need for conserving natural enemies of pests. 270
- Virus insecticides. 275
- Research yields easily applied virus deadly to codling moth larvae. 276
- The Hessian fly. 281
- What happens when sprays are no longer needed for control of codling moth. 282
- Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284
- An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae. 286
- Phylloxera: Scourge of the vineyard. 289
- A note on the control of the semi-cooper, *Aethaea Janata* L., on castor. 291
- The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292
- The sugarbeet nematode. Problems and progress in its control in Colorado. 293
- Nematodes can be controlled. 294
- Relative efficacy of different oil-cakes on the incidence. of root-knot nematodes. 298
- A minimum cultivation trial with maize using paraquat herbicide. 309
- Weed biology - A future. 321
- Pesticide residues in ointment bases of natural origin. 496
- Reduction of parathion residue on celery. 497
- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509
- PLANT PROTEINS**
- Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536
- PLANT QUARANTINE**
- Fireblight: A disease we don't want. 230
- PLANT REGULATORS**
- Gibberellin A23 in immature seeds of *Lupinus luteus*. 199
- Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koeh). 267
- Shifts in disease resistance induced by growth regulators. 514
- Short-term growth response to growth regulators in roots of *Zea mays*. 515
- Chemical aids figure in plant propagators' reports. 516
- Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- Growth of *Sclerotium rolfsii* at different concentrations of oxygen and carbon dioxide. 523

SUBJECT INDEX

PLANT TAXONOMY

- The influence of plant-growth factors on the initiation and growth of crown-gall tumours on primary pinto bean leaves. 527
- Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529
- GA increases tangelo yields. 530
- Effect of gibberellic acid on gamma irradiated barley seeds. 531
- PLANT TAXONOMY**
- Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236
- PLANT TRANSLOCATION**
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Chemical weed control. 301
- Effect of atrazine on oats (*Avena sativa* var. Min-hafer) I and II. (abstract). 490
- Translocation of systemic fungicides. 519
- The status of some micronutrients in healthy Robusta banana plants. 544
- PLANTING**
- How to produce high yields. 194
- Citrus culture. 202
- The sugarbeet nematode. Problems and progress in its control in Colorado. 293
- PLANTS**
- Plant protection and the economical position of farming. 195
- Defoliation in Vietnam. 214
- Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials. 539
- PLASMODIUM LOPHURAE**
- A filterable, proliferating factor simulating autoimmunity in malarious and nonmalarious ducklings. 392
- PLASMOLYSIS**
- Concerning some aspects of tissue nourishing gall mites. 129
- PLASTICS**
- Insect resistant thermoplastic compositions. Patent 3,408,323. 556
- PLEBEJUS ARGYROGNOMON**
- Notes on *Plebeius argyrognomon* Bgstr. (Lepidoptera, Lycaenidae). 54
- PLOWING**
- Effect of topsoil deepening on weed infestation of following crops. 310
- Slugs cause damage in Ohio cornfields. 328
- PLUMS**
- Changes in the growth-regulator content of plum infested with fruit tree red spider mite, *Panonychus ulmi* (Koch). 267
- POISONING**
- Look what's happening to insect control. 94
- Decay of rubber wood in a replanting and its effect on root disease. 245

- Rat poison and insecticide. 329
- Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478
- Macrozamia poisoning. 508
- Suspected sodium fluoroacetate poisoning in sheep and cattle. 511
- POLAROGRAPHY**
- The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562
- POLISTES BISCHOFFI**
- The position of *Polistes* (*Leptopolistes*) *bischoffi* Weyrauch (Hymenoptera: Vespidae). 27
- POLLINATION**
- Pollination with the spray apparatus. 209
- GA increases tangelo yields. 530
- POLYDESMUS**
- Integumental pigments of the millipede, *Polydesmus angustus* (Latzel). 133
- POLYETHYLENE GLYCOL**
- Concentration of certain myxoviruses with polyethylene glycol. 378
- POLYGONUM CONVULVULUS**
- Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
- POLYHEDROSES**
- Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nuclearpolyhedroses virus. 171
- POLYMERS**
- Insect resistant thermoplastic compositions. Patent 3,408,323. 556
- POLYMORPHISM**
- A revision of the genus *Copris* Muller of the Western Hemisphere (Coleoptera, Scarabaeidae). matthews, e g. 5
- Trichogrammatidae--the smallest winged insects. 42
- The control of polymorphism in aphids. 115
- POLYSACCHARIDES**
- The biochemistry of sugars and polysaccharides in insects. 176
- POPILLIA JAPONICA**
- The present status of milky disease of Japanese beetle in Connecticut. 62
- Cytology of milky disease bacteria. I. Morphogenesis of *Bacillus popilliae* in vivo. 64
- POPULATION**
- The measurement and interrelationships of infections with *Nosema apis* and *Malpighamoeba mellificae* of honey-bee populations. 59
- The fate of immature housefly populations at low and high densities. 66
- Larval movement of *Lasioderma serricorne* (F.) (Coleoptera: Anobiidae) in a plane. 116
- Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu latiore (Hemipt. Aphid.). 127
- From grasshopper to a locust. 141

- A mathematical model for two *Tribolium* populations in competition. 164
- Defoliation in Vietnam. 214
- The state of weeds when applying herbicides and insecticides in corn fields. 318
- A consideration of insecticide effects on hypothetical avian populations. 499
- POPULATION STATISTICS**
- Computing a population budget from sequentially sacrificed, replicated cultures. 156
- POPULUS**
- A massive invasion of *Stilpnotia salicis*. (Lymantriidae). 46
- PORPHYRINS**
- Integumental pigments of the millipede, *Polydesmus angustus* (Latzel). 133
- PORTHETRIA DISPAR**
- Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests. 72
- Tests on standardization of *Bacillus thuringiensis* preparations. 100
- The principal parasites observed on the leaf roller moths of Spain with particular attention to *Lymantria dispar* L. 143
- Pathologic complications during the larval development of *Lymantria dispar* in the laboratory. 145
- The gypsy moth threat in America. 216
- POTASSIUM**
- Tempting the soybean's erratic appetite. 228
- POTASSIUM HYDROXIDE**
- Reduction of parathion residue on celery. 497
- POTATO-TUBER**
- Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487
- POTATOES**
- The detection of primary infections of virus diseases in potato plant cultures. 244
- The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292
- POULTRY**
- Urinary conversion products of injected progesterone-4-14-C in the domestic fowl. 332
- Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338
- Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR. 343
- Nutrient requirements of poultry. 397
- Report of the committee on nomenclature and reporting of disease, Northwestern Conference on Avian Diseases, June 1968. 400
- Tick fever in poultry. 415
- Disease reports of the Southern Conference on Avian Diseases (SCAD) 1967. 421
- Official FDA tolerances. 482
- Carotenoid compounds. Patent 3,408,406. 552

SUBJECT INDEX

PUPAE

- Crop and livestock depredation reduced by wildlife services damage control programs. 579
- POULTRY DISEASES**
 Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis. 355
 Medical observations concerning ornithosis control in the poultry industry. 365
 Breast blisters in turkeys. 402
 Tick fever in poultry. 415
 The effects of various drugs on experimental chicken coccidiosis. 425
- POULTRY INDUSTRY**
 Two sides to the vaccine picture. 345
 Medical observations concerning ornithosis control in the poultry industry. 365
- PRECIPITATION**
 Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487
- PREDACEOUS INSECTS**
 Taxonomic problems in ecological research on entomophagous insects. 12
 Bibliography on the systematics of entomophagous insects VI. 19
 Look what's happening to insect control. 94
 Fly enemies...your allies. 117
- PREDACEOUS MITES**
 A defense mechanism in *Onychiurus* (Collembola, Onychiuridae). 166
- PREDATORY ANIMALS**
 Crop and livestock depredation reduced by wildlife services damage control programs. 579
- PREVENTIVE MEDICINE**
 Disease prevention. 330
 Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967. 339
 Drugs: How do you use them. 350
 Anti-rabies vaccinations at the Montpellier Center in 1967. 383
 Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967. 384
 Anti-rabies vaccinations at the Pasteur Institute in 1967. 387
 Anti-rabies vaccinations at the Marseille Pasteur Center in 1967. 417
- PRISTIPHORA ERICHSONII**
 Considerations on the toxic and labile substance produced by *Bacillus thuringiensis* var. *thuringiensis* Berliner (labile exotoxin). 154
- PROCAINE**
 Notice of filing of petition for food additives deoquinat and procaine penicillin. 379
- PROCESSING**
 Process for preparing bis-(3,5,6-trichloro-2-hydroxyphenyl) methane. Patent 3,408,408. 553
 Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555
- PRODUCTIVITY**
 Gains from worm drenching ewe hoggets in South Canterbury. 445
- PROGESTERONE**
 Urinary conversion products of injected progesterone-4-14-C in the domestic fowl. 332
- PROLINE**
 Studies on wheat plants using 14C-labelled compounds. XXII. Incorporation into wheat protein. 536
- PROMETRYNE**
 Improved GLC method for s-triazine residue determination. 498
 Influence of some aminotriazine herbicides on some soil fungi. 537
- PROPAGINE**
 Improved GLC method for s-triazine residue determination. 498
- PROPERTIES**
 The properties of insect axons. 132
- PROPYLENE OXIDE**
 Isolation and determination of chlorohydrins in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 489
- PROTEINS**
 Amino acid and protein metabolism in insect development. 73
 A study proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 77
 Melanin in an insect, *Lucilia cuprina* (Wied.). 97
 Metabolic control mechanisms in insects. 98
 The biochemistry of the insect fat body. 110
 The chitin/protein complexes of insect cuticles. 144
 Electrophoretic separation of the hemolymph proteins in the silkworm, *Bombyx mori* L., infected with the nucleopolyhedrovirus. 171
 On the occurrence and treatment of actinobacillosis in cattle. 235
 Nutrient requirements of dairy cattle. 398
 Nutrient requirements of horses. 399
 Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation. 423
 The outer layer of the cell envelope of *Halobacterium halobium*. 564
- PROTOZOA**
 Protozoan and nematode infections of insects. 173
- PRUNING**
 How to produce high yields. 194
 Coffee berry disease. 226
 Dieback. 251
 Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517
- PSEUDOCOCCUS OBSCURUS**
 The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig. 181
- PSEUDOMONAS AERUGINOSA**
 Cytochrome c and evolution. 434
- PSEUDOMONAS STRIAFACIENS**
 Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260
- PSEUDORABIES**
 A focal point of pseudorabies of dogs in the Department of Ain. 366
- PSEUDOTORYMUS AMETHYSTINUS**
 New species of palaearctic Tormidae (Hym. Tormidae). 49
- PSYCHIDAE**
 Materials for a revision of the genus *Oreopsycha* (Psychidae). 14
 Materials for a revision of the genus *Oreopsycha* (Psychidae). 15
- PSYLLIDAE**
 Palaearctic encyrtids parasites of psyllids. 85
- PTERIDINE**
 The biochemistry of the insect fat body. 110
- PTEROMALIDAE**
 Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbya* Delucchi, with descriptions of two new species. 6
- PTEROPHORIDAE**
 Some thoughts on the Pterophoridae of the French fauna. 11
- PUBLIC HEALTH**
 Problems of public health and medical entomology. 186
 Objectives and role of the water pollution control administration on water quality standards. 467
 Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478
- PUCCINIA ANTIRRHINI**
 Directional growth of the urediospore germ tubes and stomatal penetration. 242
- PUCCINIA GLUMARUM**
 Physiological races of *Puccinia striiformis* in the wheat of Iran. 246
- PUCCINIA RECONDITA**
 Physiological races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236
- PUCCINIA STRIIFORMIS**
 Physiological races of *Puccinia striiformis* in the wheat of Iran. 246
- PUMPKINS**
 We Squashed the weeds. 326
- PUPAE**
 The fate of immature housefly populations at low and high densities. 66
 Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.). 86
 Melanin in an insect, *Lucilia cuprina* (Wied.). 97
 Computing a population budget from sequentially sacrificed, replicated cultures. 156
 A fruit pest is being sterilized. 272
 Effect of ecdysone on the puparium formation in irradiated *Ephestia kuehniella* Z. 532

SUBJECT INDEX

PURIFICATION

PURIFICATION

Partial purification of sugarcane mosaic virus by filtration through gel.

219

PURINES

The biochemistry of the insect fat body.

110

PYRALIDAE

Biological notes on eye-frequenting moths from North Thailand.

71

PYRAUSTA NUBILALIS

Resistance to cold in *Ceratonia catalpae*.

1

PYRAZON PLUS LENACIL

Factors influencing the selectivity of herbicides.

500

PYRETHRUM

Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin.

187

PYRIMIDINES

Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth.

540

QUANTITATIVE ANALYSIS

The use of gas chromatography in detecting lindane in sewage effluent.

483

Collaborative study of an ultraviolet method for measuring diquat content in formulations.

549

RABBITS

The productivity of *Glossina austeni* Newst. maintained on cop-eared rabbits.

109

Endotoxin properties of *Leptospira canicola*.

359

Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation.

407

False-positive coagulase reactions in the characterization of microorganisms isolated from foods.

457

RABIES

Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967.

339

The practice of the present diagnostic of rabies.

377

Anti-rabies vaccinations at the Montpellier Center in 1967.

383

Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967.

384

Anti-rabies vaccinations at the Pasteur Institute in 1967.

387

An outbreak of rabies in swine.

413

Anti-rabies vaccinations at the Marseille Pasteur Center in 1967.

417

RABIES VIRUS

Isolation of rabies virus from fruit bats in Thailand.

419

RADIATION

The effect of bioclimate on the communication system of night-flying moths.

170

A fruit pest is being sterilized.

272

RADIOACTIVE TRACERS

Redistribution of ⁴⁵Ca in *Trifolium subterraneum* L. and *Antirrhinum majus* L.

243

RADIOACTIVITY

Urinary conversion products of injected progesterone-4-¹⁴C in the domestic fowl.

332

Defense possibilities of society against pollution of food and environment.

466

RADIOBIOLOGY

Peroxidase isozymes in barley leaves from irradiated seeds.

554

RANGES

Invasion of grassland by *Baccharis pilularis* DC.

314

RAPHIDIA ALOYSIANA

Sialis nigripes Pictet. *Raphidia* (*Agulla*) *alloysiana* Costa and *Inocellia keiseri* Aspöck, new for Switzerland. (*Neuroptera* s.l.).

22

RATOON STUNT

Plant inspection and what it entails.

258

Ratoon stunting disease and drought a disastrous combination.

259

RATS

The effect of mucin on the amino acid absorption in the rat intestine.

203

Rat poison and insecticide.

329

Neural lesions in the offspring of female rats fed a copperdeficient diet.

349

Acute and chronic erysipelotheirus rhusiopathiae infection in rats: Histopathological examination.

362

Influence of microorganisms on intestinal absorption: Oleic acid 131I and triolein 131I absorption by germfree and conventionalized rats.

427

Potential of toxicology of sumithion by phosphamidon in the rat. (abstract).

505

Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract).

512

RECURVARIA LEUCATELLA

The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees.

269

RED CLOVER

Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.).

542

REDUVIIDAE

Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae).

9

REFUSE DISPOSAL

Fly and economic evaluation of urban refuse systems. Part II. AN efficiency analysis of paper bag containers.

452

REGRESSION ANALYSIS

Variation in the host-parasite relationship of a crop disease.

218

REPORTS

68th annual report of the Bureau of Sugar Experiment Stations.

191

Annual plant protection report 1966.

197

First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton.

204

First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) IV. Beothos.

335

First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton.

336

Cholera eradication progress report.

374

Trichinosis and sarcosporidiosis in a puma.

380

Report of the committee on nomenclature and reporting of disease, Northwestern Conference on Avian Diseases, June 1968.

400

Disease reports of the Southern Conference on Avian Diseases (SCAD) 1967.

421

Chemical aids figure in plant propagators' reports.

516

First report of the regular limnological survey of Lake Biwa (Oct. 1965-Dec. 1966) V. Abiotic environment.

559

REPRODUCTION

Observations on the reproduction of *Hemitarsonemus latus* (Banks) (Acarina Tarsonemidae).

137

Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions.

172

The studies of the behavior of *Culex pipiens fatigans* with special reference to dispersal, mating and feeding.

178

Directional growth of the urediospore germ tubes and stomatal penetration.

242

Inhibition of flowering in *Hyoscyamus niger* by 6-azauracil without suppression of stem growth.

540

REPRODUCTIVE ORGANS

On the accessory glands of the male reproductive apparatus of *Dolichopoda geniculata* Costa (Orthoptera, Raphidophoridae).

138

Cultures of insect tissues with the aid of mammalian serum.

168

Preliminary study of an enterovirus isolated from a balanoposthite lesion of cattle.

357

RESEARCH

Resistance to cold in *Ceratonia catalpae*.

1

Taxonomic problems in ecological research on entomophagous insects.

12

Cytology of milky disease bacteria. II. Morphogenesis of *Bacillus popilliae* in vitro.

63

Look what's happening to insect control.

94

A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.).

159

Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* (L.)) by means of egg parasites of the genus *Trichogramma*.

161

Electron microscopic study of the intracellular rickettsia pathogenesis using *Melolontha melolontha* L.

169

Mite chromosomes: an exceptionally small number.

183

Timber. *Tetrameles nudiflora* R., resistant to teredid borers in Bombay harbour.

198

The effect of mucin on the amino acid absorption in the rat intestine.

203

The effect of temperature and fumigation on the nitrification rate in soil.

215

The gypsy moth threat in America.

216

- Varietal resistance to clover rot in white clover. 217
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236
- Control of race 2 *Fusarium* of tomatoes. 237
- Plant inspection and what it entails. 258
- Research yields easily applied virus deadly to codling moth larvae. 276
- Control of insect and mite pests of small fruits. 283
- Aphelenchoides bicaudatus*, a parasite of cultivated mushroom. 299
- Effect of topsoil deepening on weed infestation of following crops. 310
- Sagebrush reinvasion as affected by some environmental influences. 312
- Studies of the influence of some predominant weeds on the yield pattern of spring barley. 313
- Herbicides in Vietnam: AAAS board seeks field study. 316
- A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii. 327
- Studies on acute Marek's disease. VI. Body temperature of infected chickens. 354
- Application of stresses to foot-and-mouth disease virus. 358
- Research note: Observations on immune factors associated with arizona group infections in turkeys. 364
- Trichinosis and sarcosporidiosis in a puma. 380
- Epizootiology of bluetongue. Abstract. 390
- Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation. 407
- Studies on acute Marek's disease. IV. Relative susceptibility of different lines and crosses of chickens to GA isolate. 412
- Isolation of rabies virus from fruit bats in Thailand. 419
- Effectiveness of antibacterials infused into the proximal colon on the pig. 426
- Experimental bluetongue disease in white-tailed deer. Abstract. 428
- Experimental bluetongue disease in white-tailed deer. 431
- Effect of agriculture on nitrate pollution of groundwater. 469
- Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486
- Drugs - their use and abuse. 501
- Inhibition of photosynthetic electron transport by ioxynil. 521
- Morphological changes in wheat caused by the action of chlorocholinechloride-CCC. 524
- Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of *Equisetum* spore mother cells in syndetic stage. 526
- GA increases tangelo yields. 530
- Study of the interaction of growth retardants and a virus on the growth of *Prunus persica* line GF 305. 535
- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- Collaborative study of microbiological assay of oxytetracycline in feeds. 545
- Peroxidase isozymes in barley leaves from irradiated seeds. 554
- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557
- Collaborative study of gas chromatographic analysis of heptachlor content of formulations. 563
- Apparent sap velocities in big sagebrush as related to nearby environment. 573
- RESIDUES**
- Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79
- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509
- RESINS**
- Molded from wood fibers, new family of products for variety of markets. 572
- RESISTANCE**
- Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn). 264
- RESPIRATION**
- The regulation of breathing in insects. 128
- RESPIRATORY DISEASES**
- Experimental infection of calves with Myxovirus parainfluenza-3 and *Pasteurella haemolytica*. 340
- RETAIL MARKETING**
- Retailing of barbecued chickens: A Canadian survey. 459
- Retailing of barbecued chickens: A survey in British Columbia. 463
- REVIEWS**
- Iconography of the eggs of the Lepidoptera fauna of Belgium. 147
- Iconography of the eggs of the Lepidoptera fauna of Belgium. 148
- Forty years of pest control work. 210
- RHABDOPHAGA RAMICOLA**
- Biological observations on *Rhabdophaga ramicola* Rubs. 40
- RHIPICEPHALUS SANGUINEUS**
- Resistance capacity of ticks against starvation under laboratory conditions. 140
- RHIZOPUS NIGRICANS**
- Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches. 233
- RHOPALOCERA**
- Some interesting *Rhopalocera* of Eastern Spain. 13
- RHOPALOSIPHUM MAIDIS**
- A model of the plant-to-plant movement of aphids. I. Description of the model. 153
- RHYPAROCHROMINAE**
- The biology and ecology of the Rhyparochrominae of New England (Heteroptera: Lygaeidae). I. 50
- RIBONUCLEIC ACID**
- Effect of ecdysone on the puparium formation in irradiated *Ephesia kühniella* Z. 532
- The outer layer of the cell envelope of *Halobacterium halobium*. 564
- RICE**
- Hybrids of *Nephotettix impicticeps* Ish. and *N. apicalis* (Motsch.) and their ability to transmit the tungro virus to rice. 119
- Application of insecticides to paddy water for more effective rice pest control. 205
- Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus. 279
- Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529
- Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533
- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- RICKETTSIAL DISEASES**
- Electron microscopic study of the intracellular rickettsia pathogenesis using *Melolontha melolontha* L. 169
- RICKETTSIELLA**
- Some remarks on the *Hydrophilia* disease of the larvae of *Melolontha melolontha* C.(Col. Scarabaeidae). 105
- RODENT CONTROL**
- Pests are endangering our cultivated plants. 211
- Rat poison and insecticide. 329
- RODENTICIDES**
- Rat poison and insecticide. 329
- RODENTS**
- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae). 9
- Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue. 453
- ROOT KNOT**
- Relative efficacy of different oil-cakes on the incidence. of root-knot nematodes. 298

SUBJECT INDEX

ROOTS

ROOTS

- Container growing. Chapter 22: Insects and diseases. 206
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Decay of rubber wood in a replanting and its effect on root disease. 245
- Eelworms in tea: Some problems. 295
- Short-term growth response to growth regulators in roots of *Zea mays*. 515

ROT

- Varietal resistance to clover rot in white clover. 217
- Control of post-harvest decay and the influence of postharvest treatments on decay in clingstone-peaches. 233
- Heat pasteurization and chemical fungicides for control of *Fusarium* rot of California cantaloups. 263

ROUND HEART DISEASE

- Pathogenesis of the round heart syndrome in turkeys. 410

RUBBER

- Dieback. 251
- Phytophthora leaf fall and pod rot. 252

RUBROSTERONE

- Synthesis of rubrosterone, a metabolite of insect-moulting substances from *Achyranthes rubrofusca*. 102

RUMINANTS

- Epizootiology of bluetongue. Abstract. 390

RURAL DEVELOPMENT

- The 'Local Angle'. 576

RURAL POPULATION

- Tonsillar carcinoma in rural dogs. 405

RYE

- Triticale in 1967. 225

SAINFOIN

- Sainfoin - a dryland forage crop for Montana. 322

SALICYLANILIDES

- Anthelmintic effect of salicylanilide preparation on common liver flukes. 449

SALIVARY GLANDS

- Isolation of rabies virus from fruit bats in Thailand. 419

SALIX

- Biological observations on *Rhabdophaga ramicola* Rubs. 40

SALMON

- Effect of DDT on temperature selection by young atlantic salmon, *Salmon solar*. (Abstract). 484

SALMONELLA

- Retailing of barbecued chickens: A Canadian survey. 459
- Immunofluorescent screening for *Salmonella* in foods: Comparison with culture methods. 461
- Note on the simultaneous use of polyvalent H and Spicer-Edwards H antisera as a preliminary step in the identification of *Salmonellae*. 464

SALMONELLA TYPHIMURIUM

- Modifications of the natural resistance to infection of mice treated by several histone fractions. 403

- Diagnosis and treatment of chronic *Salmonella typhimurium* infection in sows. 443

- Retailing of barbecued chickens: A survey in British Columbia. 463

SALTS

- Certain metal salt complexes useful for controlling helminths and improving growth in animals. Patent 3,408,444. 442

SAMPLING

- Parathion residue in cured alfalfa. 495

SAP

- Apparent sap velocities in big sagebrush as related to nearby environment. 573

SAPONINS

- Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with 10 and 25 milligrams of saponine per dose. 341

SARCOSPORIDIOSIS

- Trichinosis and sarcosporidiosis in a puma. 380

SCABIES

- Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338

SCARABAEIDAE

- A revision of the genus *Copris* Muller of the Western Hemisphere (Coleoptera, Scarabaeidae). matthews, e.g. 5

- Species differences in scarab-pasture relationships. 76

- Some remarks on the *Hydrophilia* disease of the larvae of *Melolontha melolontha* C.(Col. Scarabaeidae). 105

SCARLET RUNNER BEANS

- Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534

SCHEDORHINOTERMES

- African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae). 28

SCHIZAPHIS DUBIA

- A new genus and four new species of Aphids (Homoptera, Aphididae) from Poland. 103

SCHRANKIA HUMIDALIS

- New species for the Belgian fauna. 35

SCLEROTINIA

- Control of lettuce leaf drop by soil drenching with fungicides. 253

SCLEROTINIA TRIFOLIORUM

- Varietal resistance to clover rot in white clover. 217

SCLEROTIUM ROLFSSII

- The susceptibility of some cultivated plants to *Sclerotium rolfssii* Sacc. 247

- Growth of *Sclerotium rolfssii* at different concentrations of oxygen and carbon dioxide. 523

SCRAPIE

- Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351

SECRETION

- Neurosecretion in *Dolichopoda geniculata* Costa: Observations on pars intercerebralis and on the retrocerebral endocrine system. 61

- On arthropod defensive secretions XXV. Anthranilic acid as a precursor of glomerin and homoglomerin, alkaloids from arthropods. 149

SEED GERMINATION

- The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.). 288

- Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529

SEED PLANTING

- The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.). 288

SEED POTATOES

- The method of testing seed potatoes by mean of the callose (Igel-Lange) test. 292

SEED TREATMENT

- Hindsight and foresight can control cotton seedling disease. 222

- Status of seed treatment for barley smut control. 240

- Ratoon stunting disease and drought a disastrous combination. 259

- Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn). 264

- We Squashed the weeds. 326

- Effect of several growth regulators and temperature treatment to rice seed on the germination and initial growth of seedling. 529

- Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538

SEEDLINGS

- Hindsight and foresight can control cotton seedling disease. 222

- Didymella bryoniae*, a new fungus parasite of cucumber cultures. 232

- Effect of atrazine on oats (*Avena sativa* var. Min-hafer) I and II. (abstract). 490

- Shifts in disease resistance induced by growth regulators. 514

- Manganese toxicity in tomato seedlings. 518

- Effect of gibberellic acid on gamma irradiated barley seeds. 531

- Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534

SEEDS

- Gibberellin A23 in immature seeds of *Lupinus luteus*. 199

- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471

- Peroxidase isozymes in barley leaves from irradiated seeds. 554

SEMERON

- New possibilities of weed control in chicory (*Cichorium intybus*). 317

SEROLOGICAL TESTS

- Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68

- Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand. 224
- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344
- Feline panleucopenia- a serological study. 356
- Preliminary study of an enterovirus isolated from a balanoposthite lesion of cattle. 357
- A serological inquiry about brucellosis in Toulouse veterinary students. 363
- Medical observations concerning ornithosis control in the poultry industry. 365
- Studies on the epidemiology of vesicular stomatitis virus. 376
- The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389
- Characterization of agglutinins of cattle serum against *Brucella abortus*. 411
- Studies on vibronic infection of sheep and carion crows. 450
- Note on the simultaneous use of polyvalent H and Spicer-Edwards H antisera as a preliminary step in the identification of *Salmonellae*. 464
- SERUM**
- Cultures of insect tissues with the aid of mammalian serum. 168
- Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429
- SERUM ALBUMIN**
- Blood chemical and cellular changes in canine dirofilariasis. 420
- SERUM NEUTRALIZATION TEST**
- A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348
- SEWAGE DISPOSAL**
- The use of gas chromatography in detecting lindane in sewage effluent. 483
- SEX ATTRACTANTS**
- Sex attractant of sugar beet wirework: Identification and biological activity. 55
- SEX BEHAVIOR**
- Observations on the reproduction of *Hemitarsonemus latus* (Banks) (Acarina Tarsonemidae). 137
- SHADE TREES**
- The biology of *Thanatopsycha chilensis* (Philippi) (Lepidoptera). 101
- SHEEP**
- Interstate transportation of animals and poultry. Scabies in sheep. Interstate movement. 338
- Control by ovarian status of induced leukocytic responses in the sheep uterus. 346
- Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351
- Some effects of route of administration and dilution on the toxicity of carbon tetrachloride drenches for sheep. 361
- Brucella ovis* infection. 373
- Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429
- Strain variation in the response of *Haemonchus contortus* in sheep and goats given phenothiazine: Efficacy of N.F. and purified products on pure parasitic infections. 439
- Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444
- Gains from worm drenching ewe hoggets in South Canterbury. 445
- The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447
- Studies on vibronic infection of sheep and carion crows. 450
- Suspected sodium fluoroacetate poisoning in sheep and cattle. 511
- SHOCK**
- Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- SHRUBS**
- Invasion of grassland by *Baccharis pilularis* DC. 314
- SIALIS NIGRIPES**
- Sialis nigripes* Pictet, *Raphidia* (Agulla) *aloyisiana* Costa and *Inocellia keiseri* Aspöck, new for Switzerland. (Neuroptera s.l.). 22
- SILICA GELS**
- Solid state fluorescence emission of aflatoxins on silica gel. 460
- SILICON**
- Effect of nitrogen, silicon and their interaction on the agronomic characters in paddy rice. 533
- SILVEX**
- Control of Dalmatian toadflax. 320
- SIMAZINE**
- New weed killers boost orchard conservation. 304
- Tree line weed control in Goulburn Valley orchards. 325
- Improved GLC method for s-triazine residue determination. 498
- Influence of some aminotriazine herbicides on some soil fungi. 537
- SINIGRIN**
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- SKIN**
- Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin. 187
- SLUDGE**
- The use of gas chromatography in detecting lindane in sewage effluent. 483
- SLUGS**
- Slugs cause damage in Ohio cornfields. 328
- SOCIAL INSECTS**
- Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89
- From grasshopper to a locust. 141
- SODIUM ARSENATE**
- Tests on standardization of *Bacillus thuringiensis* preparations. 100
- SODIUM ARSENITE**
- Decay of rubber wood in a replanting and its effect on root disease. 245
- SODIUM FLUOROACETATE**
- Rat poison and insecticide. 329
- Suspected sodium fluoroacetate poisoning in sheep and cattle. 511
- SOIL ANALYSIS**
- The effect of temperature and fumigation on the nitrification rate in soil. 215
- Long-term movement of DDT applied to soil for termite control. 492
- Manganese toxicity in tomato seedlings. 518
- Growth of planted chestnut trees (*Castanea crenata*) in relation to soil nutrients in Korea. 528
- SOIL CONSERVATION**
- Sampling pests and diseases of tea. II. 254
- SOIL CONTAMINATION**
- Are fertilizers creating pollution problems. 468
- Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others. 470
- Improved GLC method for s-triazine residue determination. 498
- SOIL FERTILITY**
- Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials. 539
- SOIL FUMIGATION**
- The sugarbeet nematode. Problems and progress in its control in Colorado. 293
- SOIL FUNGI**
- Influence of some aminotriazine herbicides on some soil fungi. 537
- SOIL HORIZONS**
- Effect of topsoil deepening on weed infestation of following crops. 310
- SOIL MICROORGANISMS**
- Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442. 78
- SOIL MOISTURE**
- Insect mycology: Glimpses and perspectives. 131
- SOIL SERIES**
- The effective breadth and action of temik. (Experiences from Germany). 135
- Sampling pests and diseases of tea. II. 254
- Eelworms in tea: Some problems. 295
- Effect of topsoil deepening on weed infestation of following crops. 310

SUBJECT INDEX

SOIL STERILIZATION

SOIL STERILIZATION

- Verticillium wilt in the tomato cultures of the Valais. 231
- Didymella bryoniae, a new fungus parasite of cucumber cultures. 232
- Control of race 2 Fusarium of tomatoes. 237

SOIL TEMPERATURE

- Insect mycology: Glimpses and perspectives. 131
- The effective breadth and action of temik. (Experiences from Germany). 135

SOIL TEXTURE

- The effect of temperature and fumigation on the nitrification rate in soil. 215

SOIL TREATMENT

- Resistance power of the Austrian winter wheat assortment against dwarf bunt (Tilletia controversa Kuhn). 264
- Nematodes can be controlled. 294
- Chemical control of weeds in fields and in the open country. 302
- Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487

SOILS

- Controlling soil insects with parathion-pentachlorophenol compositions. Patent 3,408,442. 78
- 68th annual report of the Bureau of Sugar Experiment Stations. 191
- How to produce high yields. 194
- Defoliation in Vietnam. 214
- Coralloid root systems in plants showing lime induced chlorosis. 234
- Control of lettuce leaf drop by soil drenching with fungicides. 253
- Problems of fungicidal efficiency. 255
- Aphelenchoides bicaudatus, a parasite of cultivated mushroom. 299
- Chemical weed control. 301
- Sagebrush reinvasion as affected by some environmental influences. 312
- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471
- Factors influencing the selectivity of herbicides. 500
- Effect of soil fertility on the distribution of plant communities as shown by pot cultures and field trials. 539

SORGHUM

- Sorghum on the move. 188
- Tolerance and exemptions from tolerances for pesticide chemicals in or on raw agricultural commodities. O,Odiethyl S-2-(ethylthio) ethyl phosphorodithioate. 479

SOUND WAVES

- Ultrasound to stop the moths settling. 265

SOYBEANS

- Tempting the soybean's erratic appetite. 228

- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471

SPECTROMETRY

- Identification of gibberellins in crude plant extracts by combined gas chromatography-mass spectrometry. 534

SPECTROPHOTOMETRY

- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557

SPHENARCHES ANISODACTYLUS

- Note on Sphenarches anisodactylus, Wkr. damaging bottle gourd (Lagenaria lucantha, Rusby). 285

SPINACH

- Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate. 485
- Collaborative study of the thin layer chromatographic method for carbaryl residues in apples and spinach. 486

SPIRACLES

- The regulation of breathing in insects. 128

SPLEEN

- Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385
- Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393

SPORES

- Environmental humidity and the susceptibility of larvae of Anagasta kuhniella Zell. to Bacillus thuringiensis Berliner. 91
- Effects of temperature and water on viability and virulence fo Bacillus thuringiensis var. thuringiensis Berliner spores. 106
- New facts concerning the extrusion of microsporidian spores. 122
- Concurrent microscopical, cytochemical and electron microscopical study on the cell polarity of Equisetum spore mother cells in syndetic stage. 526

SPRAYING

- Controlling the Mexican bean beetle. 56
- Application of beta-propiolactone on the rearing of the silkworm, Bombyx mori L. 167
- An appraisal of high medium and low volume methods of spray application. 192
- Application of insecticides to paddy water for more effective rice pest control. 205
- Pests are endangering our cultivated plants. 211
- Coffee berry disease. 226
- Some facts about fungicides. 262
- What happens when sprays are no longer needed for control of codling moth. 282
- Chemical control of weeds in fields and in the open country. 302
- New weed killers boost orchard conservation. 304
- Sagebrush reinvasion as affected by some environmental influences. 312

- New possibilities of weed control in chicory (Cichorium intybus). 317

- A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii. 327

- Effects of gibberellic acid on flower thinning and bloom delay of stone fruits. 517

- For safer ULV spraying. 571

SPRAYING EQUIPMENT

- Pollination with the spray apparatus. 209
- Concentrate spraying. 570

STAPHYLOCOCCUS

- Considerations about some diseases of fowl transmittable to man: Aspergillosis, moniliasis, staphylococcosis. 355
- A new type in experimental intraperitoneal infection of staphylococci in mice. 414

STAPHYLOCOCCUS AUREUS

- False-positive coagulase reactions in the characterization of microorganisms isolated from foods. 457

STARVATION

- Resistance capacity of ticks against starvation under laboratory conditions. 140
- Swine mastitis-metritisagalactia syndrome. 369

STATISTICAL ANALYSIS

- A model of the plant-to-plant movement of aphids. I. Description of the model. 153

STATISTICAL METHODS

- Computing a population budget from sequentially sacrificed, replicated cultures. 156

STEM RUST

- The effect of sowing dates on the reactions of six wheat strains to stem rust. 248

STERILITY

- What happens when sprays are no longer needed for control of codling moth. 282
- A consideration of insecticide effects on hypothetical avian populations. 499

STERILIZATION

- Sterilization makes the mosquito hungry. 513

STERILIZATION (INSECTS)

- A fruit pest is being sterilized. 272

STERRA OCHRATA

- New species for the Belgian fauna. 39

STILPNOTIA SALICIS

- A massive invasion of Stilpnotia salicis. (Lymantriidae). 46

STOMACH

- A method for counting bacterial cells in the midgut of the silkworm larvac, Bombyx mori L. 107

STOMATA

- Directional growth of the urediospore germ tubes and stomatal penetration. 242

STORAGE

- Some facts about fungicides. 262
- Effect of warming cycles during storage on the behavior of Jonathan and Granny Smith apples in cool storages. 454
- Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473

SUBJECT INDEX

SYMPTOMATOLOGY

- DDT storage in the U. S. population. (Abstract). 488
- STORAGE DISEASES**
- Pests are endangering our cultivated plants. 211
- How fungi infect stored grains. 261
- Effect of warming cycles during storage on the behavior of Jonathan and Granny Smith apples in cool storages. 454
- False-positive coagulase reactions in the characterization of microorganisms isolated from foods. 457
- STRAWBERRIES**
- Automated analysis of organophosphorus insecticides by wet digestion-oxidation and colorimetric determination of the derived orthophosphate. 485
- STREPSIPTERA**
- Further descriptions of *Halictophagbus pontifex* Fox and *H. regina* Fox (Strepsiptera: Halictophagidae) from Uganda. 25
- STREPTOCOCCUS**
- The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389
- STREPTOCOCCUS AGALACTIAE**
- A selective-differential medium for detection of *Streptococcus agalactiae*. 367
- The occurrence of streptococci of various serological groups as the cause of mastitis with special consideration of group L. 389
- STREPTOMYCES**
- Oryzoxymycin, a new antibiotic. 371
- STREPTOMYCES HENETUS**
- Process for producing oxytetracycline antibiotic. Patent 3,408,258. 555
- STRIPE**
- Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260
- Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus. 279
- SUBSTRATES**
- The culture of *Phytophthora infestans* on fully synthetic culture medium substrata. 525
- SUBTERRANEAN CLOVER**
- Redistribution of ⁴⁵Ca in *Trifolium subterraneum* L and *Antirrhinum majus* L. 243
- SUCCINIC ACID**
- Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein. 536
- Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565
- SUCROSE**
- Responses of aphids to pressure applied to liquid diet behind parafilm membrane longevity and larviposition of *Myzus persicae* (Sulz.) and *Brevicoryne brassicae* (L9) (Homoptera: Aphididae) feeding on sucrose and sinigrin solutions. 172
- Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
- SUGAR BEETS**
- Sex attractant of sugar beet wirework: Identification and biological activity. 55
- A new contribution to the study of the cabbage moth control (*Mamestra brassicae* L.). 159
- The sugarbeet nematode. Problems and progress in its control in Colorado. 293
- Factors influencing the selectivity of herbicides. 500
- SUGARCANE**
- A new Japanese species of *Atherigona* Rond. (Diptera: Muscidae) reared from sugar-cane. 44
- 68th annual report of the Bureau of Sugar Experiment Stations. 191
- Partial purification of sugarcane mosaic virus by filtration through gel. 219
- Plant inspection and what it entails. 258
- Ratoon stunting disease and drought a disastrous combination. 259
- SUGARS**
- The biochemistry of sugars and polysaccharides in insects. 176
- Effect of hormones on the sugar level of maize (*Zea mays* L.) plants. 538
- SULFOXIDES**
- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557
- SULFUR DIOXIDE**
- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- SURFACE-ACTIVE AGENTS**
- Chemical weed control. 301
- Adsorption of maleic acid on mercury-electrolyte interface and the problem of preceding surface recombination. 565
- SURVEYS**
- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (Hemiptera Reduviidae). 9
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton. 204
- Plant inspection and what it entails. 258
- The Hessian fly. 281
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) IV. Beothos. 335
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton. 336
- The incidence of disease resulting from infection with *Haemonchus contortus* in sheep sent to the Veterinary Investigation Centres in England and Wales from 1965 to 1967. 447
- Survey of green coffee for potential aflatoxin contamination. 456
- Retailing of barbecued chickens: A Canadian survey. 459
- Retailing of barbecued chickens: A survey in British Columbia. 463
- First report of the regular limnological survey of Lake Biwa (Oct. 1965-Dec. 1966) V. Abiotic environment. 559
- Farmers' expenditures for custom pesticide service in 1964. 574
- SUSCEPTIBILITY**
- Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385
- SWINE**
- A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test. 348
- Erysipelas--our costliest pig disease. 352
- Swine mastitis-metritis agalactia syndrome. 369
- Effect of dietary fat source on the apparent digestibility of fat and the composition of fecal lipids of the young pig. 370
- Cholera eradication progress report. 374
- Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus. 375
- If vaccines go - Will hog cholera follow. 381
- Card brucellosis test... swine. 382
- Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus. 385
- Isolation and characterization of a porcine enterovirus. 386
- Tuberculosis in the pig and the tuberculin test. 388
- Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis. 391
- Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393
- Experimental data on the pathogenesis of edema disease of swine. Clinical picture, gross and microscopic lesions related to endotoxin shock. 396
- An outbreak of rabies in swine. 413
- Effectiveness of antibacterials infused into the proximal colon on the pig. 426
- Hyostrongylus rubidus*: A field study of its pathogenesis, diagnosis and treatment. 440
- Diagnosis and treatment of chronic *Salmonella typhimurium* infection in sows. 443
- Control of internal parasites of swine and sheep with dimethyl 2,2-dichlorovinyl phosphate. Patent 3,408,443. 444
- SWINE ERYSIPELAS**
- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344
- SYMPTOMATIC COSTATUS**
- Complement to the study of the larval biology of *Sympteticus costatus* Loew (Diptera Nemestrinidae), a grasshopper parasite, and general considerations on the biology of *Nemestrinidae*. 118
- SYMPTOMATOLOGY**
- Diagnosis: A central pillar of insect pathology. 162
- The present clinical and pathological picture of chronic erysipelas infection in pigs. III-V. 344
- Medical observations concerning ornithosis control in the poultry industry. 365

SUBJECT INDEX

SYNTHESIS

- A focal point of pseudorabies of dogs in the Department of Ain. 366
- Swine mastitis-metritis agalactia syndrome. 369
- Nutrient requirements of poultry. 397
- Bovine ostertagiosis. Analytical bibliographic review of the disease, its treatment and its prophylaxis. 406
- Tick fever in poultry. 415
- Tick-borne diseases of cattle in Trinidad. 438

SYNTHESIS

- Synthesis of rubrosterone, a metabolite of insect-moulting substances from *Achyranthes rubrofusca*. 102

SYRPHIDAE

- Original descriptions, synonyms and geographical distribution of the species of the Syrphidae (Diptera) family in Chile. 24

T, 2,4,5-

- Decay of rubber wood in a replanting and its effect on root disease. 245

TABLES (DATA)

- Complement to the study of the larval biology of *Sympteticus costatus* Loew (Diptera Nemestrinidae), a grasshopper parasite, and general considerations on the biology of Nemestrinidae. 118

- Morphological and biological investigations on clones and field populations of the foxglove-aphid, *Aulacorthum solani* KLTB. 1843 sensu latiore (Hemipt. Aphid.). 127

- Effect of superparasitism on the development, sex ratio and progeny of *Bracon greeni* Ashmead. 139

- Pre-gravid phase of ovarian development in *Aedes detritus* Haliday. 151

- Genetic study of a mutation modifying the sensitivity of a lambda phage to immunity. 184

- Official register of plant protection preparations and equipment 1968. 189

- Official register of plant protection preparations and equipment 1967. 190

- Methods concerning the determination of the effectiveness of insecticides against the European corn borer (*Ostrinia* (*Pyrausta*) *nubilalis* Hbn.) with small control tests and aerial chemical applications. 227

- Physiologic races of *Puccinia recondita* f. sp. *tritici* in the United States from 1926 through 1960. 236

- Physiological races of *Puccinia striiformis* in the wheat of Iran. 246

- The susceptibility of some cultivated plants to *Sclerotium rolfsii* Sacc. 247

- Biology of the spiny bollworm. 278

- The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.). 288

- Aphelenchoides bicaudatus*, a parasite of cultivated mushroom. 299

- The state of weeds when applying herbicides and insecticides in corn fields. 318

- Concentration of certain myxoviruses with polyethylen glycol. 378

- Gains from worm drenching ewe hoggets in South Canterbury. 445

- Are fertilizers creating pollution problems. 468

- Pesticide residue levels in foods in the United States from July 1, 1963, to June 30 1967. 475

- Dieldrin effects in two generations of penned hen pheasants. 502

- Household insecticides. 503

- Effects of gibberellin on photosynthesis in red clover (*Trifolium pratense* L.). 542

- The dosage of the insecticides: DDT, HCH and methoxychlor for chromatography on a thin layer and for polarography. 562

- Farmers' expenditures for custom pesticide service in 1964. 574

TACHINIDAE

- Tachinid catch in the Swiss Jura, using tent traps. 30

TANGELOS

- GA increases tangelo yields. 530

TAXONOMY

- Some biological notes on the pteromalid (Hym., Chalcidoidea) genera *Caenacis* Foerster, *Cecidostiba* Thomson and *Hobbysa* Delucchi, with descriptions of two new species. 6

- Taxonomic problems in ecological research on entomophagous insects. 12

- Supplementary notes on the orbitalis (Westw.) group of Antestiopsis (Hemiptera, Pentatomidae). 26

- African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae). 28

- The subgenera of *Austrolimnius* (Coleoptera: Elminthidae). 31

- Four new species and a new genus of Coccidae (Homoptera: Coccoidea) from Africa. 32

- The Diptera described by W. J. Rainbow from Funafuti Atoll, Ellice Islands. 43

- A new Japanese species of *Atherigona* Rond. (Diptera: Muscidae) reared from sugar-cane. 44

- The nomenclature problem of *Trichogramma* species. 45

- Species differences in scarab-pasture relationships. 76

- Some thoughts on the taxonomy of *Bacillus thuringiensis* Berliner. 124

- Eelworm in tea: Some important groups. 296

- Nematodes of the Northern Great Plains. 300

TEA

- How to produce high yields. 194

- Sampling pests and diseases of tea: III. 208

- Sampling pests and diseases of tea: II. 254

- The need for conserving natural enemies of pests. 270

- Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284

- Eelworms in tea: Some problems. 295

- Eelworm in tea: Some important groups. 296

TEMIK

- The effective breadth and action of temik. (Experiences from Germany). 135

TEMPERATURE

- Effects of temperature and water on viability and virulence of *Bacillus thuringiensis* var. *thuringiensis* Berliner spores. 106

- Effects of temperature and photoperiod on larval development in *Lestes eurinus* (Odonata: Lestidae). 123

- The effect of bioclimate on the communication system of night-flying moths. 170

- The effect of mucin on the amino acid absorption in the rat intestine. 203

- The effect of temperature and fumigation on the nitrification rate in soil. 215

- Hindsight and foresight can control cotton seedling disease. 222

- Didymella bryoniae*, a new fungus parasite of cucumber cultures. 232

- Bacterial stripe blight of oats caused by *Pseudomonas striafaciens* (Elliott) Starr et Burkholder. 260

- Biology of the spiny bollworm. 278

- The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.). 288

- Studies on acute Marek's disease. VI. Body temperature of infected chickens. 354

- The inactivation effect of beta-propiolactone on the virus or the classical fowl plague. 404

- Effect of warming cycles during storage on the behavior of Jonathan and Granny Smith apples in cool storages. 454

- Effect of DDT on temperature selection by young atlantic salmon, *Salmo salar*. (Abstract). 484

TENEBRIO

- Infectiousness of coccidians for insects. 174

TENTHREDINIDAE

- Resistance to cold in *Ceratonia catalpa*. 1

- Considerations on the toxic and labile substance produced by *Bacillus thuringiensis* var. *thuringiensis* Berliner (labile exotoxin). 154

TERATOMA

- Equine ovarian granulosa tumours. 372

TEREDO

- Timber. *Tetrameles nudiflora* R., resistant to tereid borers in Bombay harbour. 198

TERMITES

- African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae). 28

SUBJECT INDEX

TOXICOLOGY

- Long-term movement of DDT applied to soil for termite control. 492
- TESCHEN DISEASE VIRUS**
Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis. 391
- TETRANYCHIDAE**
Sampling pests and diseases of tea. II. 254
Ethion a new acaricide for control of red spider, scarlet, pink and purple mites. 284
- TETRANYCHUS URTICAE**
Old and new Acaridac, citrus plant parasites in Italy. 274
- THANATOPSYCHE CHILENSIS**
The biology of *Thanatopsycha chilensis* (Philippi). (Lepidoptera). 101
- THELOHANIA**
A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia ni*. 158
- THERMOCHEMISTRY**
Insect resistant thermoplastic compositions. Patent 3,408,323. 556
- THERMOTHERAPY**
Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand. 224
- THIAZOLE**
Quinoline derivatives: Part XIX. Potential amoebicidal agents. 551
- THIAZOLYL)-BENZIMIDIZOLE, 2-(4-**
Hyostrongylus rubidus: A field study of its pathogenesis, diagnosis and treatment. 440
Gains from worm drenching ewe hoggets in South Canterbury. 445
- THINNING (FRUIT)**
Effects of gibberellin acid on flower thinning and bloom delay of stone fruits. 517
- THIOPHOSPHATES**
Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography. 491
- THYROPROTEIN**
Excretion and storage of dieldrin in dairy cows fed thyroprotein and different levels of energy. 473
- TILLAGE**
How to produce high yields. 194
A minimum cultivation trial with maize using paraquat herbicide. 309
Effect of topsoil deepening on weed infestation of following crops. 310
- TILLETIA CONTROVERSA**
Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn). 264
- TIMBER**
Timber. *Tetrameles nudiflora* R., resistant to tercid borer in Bombay harbour. 198
- TIME**
The olive fly, *Dacus oleae* Gmel. and its parasites in Corsica, in 1959 and 1960. 84
- Effect of the time of day at which honeybee colonies are first allowed flight in a new location on their choice of flower species. 89
- Pyrethrum as an insect repellent. III. A study of the persistence of pyrethrins films, when applied in three types of formulation, as insect repellents to human skin. 187
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) II. Plankton in general and phytoplankton. 204
- Triticale in 1967. 225
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) IV. Beothos. 335
- First report of the regular limnological survey of Lake Biwa (Oct. 1965 -Dec. 1966) III. Zooplankton. 336
- First report of the regular limnological survey of Lake Biwa (Oct. 1965-Dec. 1966) V. Abiotic environment. 559
- TINEIDAE**
African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae). 28
- TISSUE CULTURE**
Cultures of insect tissues with the aid of mammalian serum. 168
Application of stresses to foot-and-mouth disease virus. 358
Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus. 375
Isolation and characterization of a porcine enterovirus. 386
Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis. 391
Evaluation of the fluorescent antibody-cell culture tests for hog cholera diagnosis. 393
Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum. 429
- TISSUES**
Concerning some aspects of tissue nourishing gall mites. 129
Integumental pigments of the millipede, *Polydesmus angustus* (Latzel). 133
Directional growth of the urediospore germ tubes and stomatal penetration. 242
Histamine in the cow: Pre- and postparturition histamine concentrations in plasma, milk, and tissue. 337
Evaluation of *Brucella abortus* strain 45/20 bacterins prepared with various adjuvants. 347
Histopathologic studies of lung changes in scrapie and nonscrapie blood line sheep maintained in a scrapie environment. 351
Staining technique to differentiate insect fragments, bird feathers, and rodent hairs from plant tissue. 453
- Persistence of chlorinated hydrocarbon insecticide residues in chicken tissues and eggs. (abstract). 494
- Manganese toxicity in tomato seedlings. 518
- TOBACCO**
Tender trap. (Abstract). 266
Virus insecticides. 275
Defense possibilities of society against pollution of food and environment. 466
Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- TOLERANCES**
Official FDA tolerances. 482
Establishment of tolerances for pesticide residues. 493
Factors influencing the selectivity of herbicides. 500
- TOMATOES**
Verticillium wilt in the tomato cultures of the Valais. 231
Control of race 2 *Fusarium* of tomatoes. 237
Manganese toxicity in tomato seedlings. 518
- TONSILS**
Tonsillar carcinoma in rural dogs. 405
- TOPOGRAPHY**
Sagebrush reinvasion as affected by some environmental influences. 312
- TORTRICIDAE**
The principal parasites observed on the leaf roller moths of Spain with particular attention to *Lymantria dispar* L. 143
- TORYMIDAE**
New species of palearctic *Torymidae* (Hym. *Torymidae*). 49
- TORYMUS FAVARDI**
New species of palearctic *Torymidae* (Hym. *Torymidae*). 49
- TOXAPHENE**
Residual effect of a number of insecticides on adults of the carabid *Pseudophonus rufipes* (Dej.). 79
- TOXICITY**
Comparative study of the enzymatic hydrolysis of the crystals of the strains of *Bacillus thuringiensis* serotype I Berliner and serotype II Anduze. 114
Some facts about fungicides. 262
Establishment of tolerances for pesticide residues. 493
- TOXICOLOGY**
Metabolism of methylcarbamate insecticides by the NADPH2-requiring enzyme system from houseflies. 4
The toxicity of insecticides to larvae of the codling moth, *Cydia pomonella* (L.). I. Intrinsic toxicity and persistence. (abstract). 95
Control of insect and mite pests of small fruits. 283
Analysis for aflatoxin M in milk. 458

SUBJECT INDEX

TOXINS

- DDT residues on pasture and in the butterfat of cows grazing pasture treated with DDT prills and DDTsuperphosphate. (abstract). 477
- Findings concerning nourishment and toxic residues in plants, other health hazards and life threats. 478
- Pesticide residues in ointment bases of natural origin. 496
- Drugs - their use and abuse. 501
- Household insecticides. 503
- Potential of toxicology of sumithion by phosphamidon in the rat. (abstract). 505
- Safe use of pesticides. 506
- Macrozamia poisoning. 508
- The use of organic tin compounds fungicides in agriculture, looked at from the toxicological point of view. 509
- Effects of 2,4-D on emergence and seedling growth of range grasses. 510
- Suspected sodium fluoroacetate poisoning in sheep and cattle. 511
- Studies of toxicity and enzyme activity resulting from interaction between chlorinated hydrocarbon and carbamate insecticides. (abstract). 512
- TOXINS**
- The biochemistry and mode of action of *Bacillus thuringiensis* Berliner and its varieties. 58
- The methods of titration and the standardization of *Bacillus thuringiensis* Berliner preparations. 67
- Study of the soluble heat-stable toxin in various strains of *Bacillus thuringiensis* Berliner. 68
- A study proteolytic enzymes contained in the chyle of *Pieris brassicae* and of substances active on the crystal of *Bacillus thuringiensis*. 77
- Considerations on the toxic and labile substance produced by *Bacillus thuringiensis* var. *thuringiensis* Berliner (labile exotoxin). 154
- A contribution to the study of the mode of action of *Bacillus thuringiensis* Berliner in regard to the flour moth *Anagasta* (*Ephesia*) *kuehniella* Zeller (*Lepidoptera*). 177
- Effect of agriculture on nitrate pollution of groundwater. 469
- Residues of parathion and methylparathion in potato tubers and in the soil, following soil treatments. 487
- The toxicity of fly ash for cattle. 507
- Manganese toxicity in tomato seedlings. 518
- Studies on the mechanism of injurious effects of toxic gases on crop plants. I. Relation between the concentration of sulfur dioxide and the degree of leaf injuries in several crops. 541
- For safer ULV spraying. 571
- TRACHEA**
- The regulation of breathing in insects. 128
- TRANSLOCATION**
- Monitoring for chlorinated hydrocarbon insecticide residues in soybeans- 1966. 471

- Long-term movement of DDT applied to soil for termite control 492
- TREE DISEASES**
- Some experiences with the use of *Bacillus thuringiensis* Berl. against forest pests. 72
- TREE INJURIES**
- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (*Hom.*, *Typhlocybidae*) grown on apple trees. 268
- The apple moth (*Recurvaria leucatella* Cl.) a little known pest of our fruit trees. 269
- TREES**
- Some impacts of beekeeping on the management of the Miombo in Tanzania. 213
- The gypsy moth threat in America. 216
- An outline of the biology of *Hypsipyla robusta* Moore, the shoot borer of the meliaceae (mahoganies) of Nigeria, together with brief comments of two stem borers and one other lepidopteran fruit borer also found in Nigerian Meliaceae. 286
- Tree line weed control in Goulburn Valley orchards. 325
- TREMATODA**
- The life span of *Fasciola hepatica* in cattle. 448
- TRIAZINES**
- Improved GLC method for s-triazine residue determination. 498
- TRIBOLIUM**
- A mathematical model for two *Tribolium* populations in competition. 164
- Infectiousness of coccidians for insects. 174
- TRICHINELLA SPIRALIS**
- Trichinosis and sarcosporidiosis in a puma. 380
- TRICHLORFON**
- A note on the control of the semi-cooper, *Achaea Janata* L., on castor. 291
- TRICHLOROPHENOXYACETIC ACID, 2,4,6-**
- Short-term growth response to growth regulators in roots of *Zea mays*. 515
- TRICHOGRAMMATIDAE**
- Trichogrammatidae--the smallest winged insects. 42
- The nomenclature problem of *Trichogramma* species. 45
- Investigations concerning the biological control of the apple moth (*Carpocapsa pomonella* (L.)) by means of egg parasites of the genus *Trichogramma*. 161
- TRICHOPLUSIA NI**
- A microsporidian, *Thelohania* sp., pathogenic for the cabbage looper *Trichoplusia ni*. 158
- TRIOLEIN**
- Influence of microorganisms on intestinal absorption: Oleic acid 1311 and triolein 1311 absorption by germfree and conventionalized rats. 427
- TRITICALE**
- Triticale in 1967. 225
- TROPICAL PLANTS**
- We Squashed the weeds. 326
- TRYPANOSOMA CRUZI**
- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the

- ecology of *Panstrongylus geniculatus* (Latreille 1811) (*Hemiptera Reduviidae*). 9
- TRYPANOSOMA GLABRA**
- Trypanosoma glabra* n. sp., parasite of Mexican frogs. Morphology and cycle in the vertebrate. 436
- TRYPANOSOMIASIS**
- Studies on some silvatic reservoirs and vectors of *Trypanosoma cruzi*. XXI: observations on the ecology of *Panstrongylus geniculatus* (Latreille 1811) (*Hemiptera Reduviidae*). 9
- TUBERCULIN**
- Tuberculosis in the pig and the tuberculin test. 388
- TUBERCULIN TEST**
- Tuberculosis in the pig and the tuberculin test. 388
- TUBERCULOSIS**
- The eradication of bovine tuberculosis and brucellosis. 368
- Tuberculosis in the pig and the tuberculin test. 388
- Differentiation of mycobacteria isolated from domestic animals. 422
- TULIPA**
- On the antibioticly active substances of the tulip (*Tulipa gesneriana*). 543
- TUNGRO**
- Hybrids of *Nephotettix impicticeps* Ish. and *N. apicalis* (Motsch.) and their ability to transmit the tungro virus to rice. 119
- TURKEYS**
- Airsacculitis relation to mycoplasmas in turkeys free of *Mycoplasma gallisepticum*. 360
- Research note: Observations on immune factors associated with arizona group infections in turkeys. 364
- Nutrient requirements of poultry. 397
- Breast blisters in turkeys. 402
- Pathogenesis of the round heart syndrome in turkeys. 410
- TYPHLOCYBA CRATAEGI**
- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (*Hom.*, *Typhlocybidae*) grown on apple trees. 268
- TYPHLOCYBIDAE**
- Leaf deteriorations brought about by the cicadella *Empoasca flavescens* F. (*Hom.*, *Typhlocybidae*) grown on apple trees. 268
- UDDERS**
- The use of *Brucella* whey complement fixation test in a herd outbreak. 408
- ULTRAVIOLET RAYS**
- The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig. 181
- Partial purification of sugarcane mosaic virus by filtration through gel. 219
- Collaborative study of an ultraviolet method for measuring diquat content in formulations. 549
- Collaborative study of the ultraviolet spectrophotometric determination of sulfoxide in formulations. 557
- UMWINSIA CAVERNOSA**
- Four new species and a new genus of Coccidae (*Homoptera: Coccoidea*) from Africa. 32

SUBJECT INDEX

URACILS	
Inhibition of flowering in <i>Hyoscyamus niger</i> by 6-azauracil without suppression of stem growth.	540
UREA	
The excretion of nitrogen in insects.	69
Nutrient requirements of dairy cattle.	398
Factors influencing the selectivity of herbicides.	500
URINE	
Urinary conversion products of injected progesterone-4-14-C in the domestic fowl.	332
UTERUS	
Control by ovarian status of induced leukocytic responses in the sheep uterus.	346
VACCINES	
Anti-rabies vaccinations at the Toulouse University Hospital Center in 1967.	339
Duration of immunity due to the use of anti hoof and mouth disease vaccine prepared with 10 and 25 milligrams of saponine per dose.	341
Diagnosis and prophylaxis of infectious laryngeal tracheitis of poultry in the USSR.	343
Two sides to the vaccine picture.	345
Drugs: How do you use them .	350
Erysipelas--our costliest pig disease.	352
Feline panleucopenia- a serological study.	356
Cholera eradication progress report.	374
Anti-rabies vaccinations at the Montpellier Center in 1967.	383
Anti-rabies vaccinations at the Pasteur Institute of Lyon in 1967.	384
Anti-rabies vaccinations at the Pasteur Institute in 1967.	387
The inactivation effect of beta-propiolactone on the virus or the classical fowl plague.	404
The use of <i>Brucella</i> whey complement fixation test in a herd outbreak.	408
Tick fever in poultry.	415
Anti-rabies vaccinations at the Marsille Pasteur Center in 1967.	417
VALERIC ACID	
Sex attractant of sugar beet wirework: Identification and biological activity.	55
VEGETABLES	
The susceptibility of some cultivated plants to <i>Sclerotium rolfsii</i> Sacc.	247
Relative efficacy of different oil-cakes on the incidence. of root-knot nematodes.	298
Weed control for the home garden.	306
Official FDA tolerances.	482
Extraction and cleanup procedure for the determination of organo-thiophosphate pesticide residues in vegetables and fruits by thin layer chromatography and gas liquid chromatography.	491
VEIGAIA	
A defense mechanism in <i>Onychiurus</i> (Collembola, Onychiuridae).	166

VELOCITY	
Apparent sap velocities in big sagebrush as related to nearby environment.	573
VENTILATION	
The regulation of breathing in insects.	128
VERTICILLIUM ALBO-ATRUM	
Verticillium wilt in the tomato cultures of the Valais.	231
VESICULAR STOMATITIS VIRUS	
Studies on the epidemiology of vesicular stomatitis virus.	376
VESPIDAE	
The position of <i>Polistes</i> (<i>Leptopolistes</i>) <i>bischoffi</i> Weyrauch (Hymenoptera: Vespidae).	27
VETERINARIANS	
Scrub tick paralysis in farm animals.	333
Pharmaceutical guide for veterinarians and students of veterinary medicine.	334
VETERINARY MEDICINE	
Disease prevention.	330
Pharmaceutical guide for veterinarians and students of veterinary medicine.	334
Medical observations concerning ornithosis control in the poultry industry.	365
Studies on vibrionic infection of sheep and carion crows.	450
VIBRIO FETUS BACTERINS	
Studies on vibrionic infection of sheep and carion crows.	450
VIRULENCE	
Evaluation of <i>Brucella abortus</i> strain 45/20 bacterins prepared with various adjuvants.	347
VIRUS DISEASES	
Medical parasitology and exotic pathology.	185
VIRUS DISEASES (ANIMALS)	
Research yields easily applied virus deadly to codling moth larvae.	276
A perplexing case of hog cholera confirmed by virus isolation and supported by the fluorescent antibody serum neutralization test.	348
Feline panleucopenia- a serological study.	356
Medical observations concerning ornithosis control in the poultry industry.	365
A focal point of pseudorabies of dogs in the Department of Ain.	366
Studies on the epidemiology of vesicular stomatitis virus.	376
The practice of the present diagnostic of rabies.	377
Concentration of certain myxoviruses with polyethylene glycol.	378
If vaccines go - Will hog cholera follow .	381
Susceptibility of embryonic swine spleen and swine kidney cell lines to hog cholera virus.	385
Isolation and characterization of a porcine enterovirus.	386
Characterisation and fractionisation of various strains of Teschen virus by column chromatography and electrophoresis.	391

VISION	
An outbreak of duck virus enteritis (duck plague) in the United States.	395
The inactivation effect of beta-propiolactone on the virus or the classical fowl plague.	404
Isolation of rabies virus from fruit bats in Thailand.	419
Indirect complement fixation in foot-and-mouth disease. I. Study of antibody response in experimental cattle and sheep. II. Screening of cattle serum.	429
Experimental bluetongue disease in white-tailed deer.	431
Penetration patterns of <i>Mycoplasma gallisepticum</i> and Newcastle disease virus through the outer structures of chicken eggs.	433
Lanjan virus, a new agent isolated from <i>Dermacentor auratus</i> in Malaya.	437
VIRUS DISEASES (INSECTS)	
The use of micro-organisms for the control of insect pests.	136
VIRUS DISEASES (PLANTS)	
Pests are endangering our cultivated plants.	211
Partial purification of sugarcane mosaic virus by filtration through gel.	219
Protection against virus diseases, an essential aspect of maintenance breeding in fruit growing in Czechoslovakia.	223
Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand.	224
The detection of primary infections of virus diseases in potato plant cultures.	244
Oat diseases and their control.	256
Inhibition by blasticidin S of the ability of leafhoppers to transmit rice stripe virus.	279
Study of the interaction of growth retardants and a virus on the growth of <i>Prunus persica</i> line GF 305.	535
VIRUSES	
Electrophoretic separation of the hemolymph proteins in the silkworm, <i>Bombyx mori</i> L., infected with the nucleopolyhedroses virus.	171
Genetic resistance of the silkworm, <i>Bombyx mori</i> L., to an infection of a flacherie virus.	182
Fenetic study of a mutation modifying the sensitivity of a lambda phage to immunity.	184
Virus insecticides.	275
Two sides to the vaccine picture.	345
Attenuation of hog cholera virus in the carrier cell strains established from kidneys of pigs experimentally infected with the virulent virus.	375
VISCERA	
Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation.	423
The toxicity of fly ash for cattle.	507
VISION	
Image formation and sensory transmission in the compound eye.	70

SUBJECT INDEX

VISUAL CLASSIFICATION

VISUAL CLASSIFICATION

Possibilities and limits of visual selection in the control of the virus diseases of grapevines: An experience with some red varieties in the Swiss romand.

224

VITAMIN A

Vitamin A deficiency. Effect on mosquito eye ultrastructure

65

VITAMINS

Nutrient requirements of poultry.

397

Nutrient requirements of dairy cattle.

398

Nutrient requirements of horses.

399

WASTE

Pollution costs money.

465

WATER

Effects of temperature and water on viability and virulence fo *Bacillus thuringiensis* var. *thuringiensis* Berliner spores.

106

How to produce high yields.

194

Nutrient requirements of dairy cattle.

398

Note on the effect of water on soxhlet extraction of some organochlorine insecticides from soil and comparison of this method with three others.

470

WATER ANALYSIS

Objectives and role of the water pollution control administration on water quality standards.

467

Are fertilizers creating pollution problems.

468

Effect of agriculture on nitrate pollution of groundwater.

469

WATER POLLUTION

Pollution costs money.

465

Defense possibilities of society against pollution of food and environment.

466

Objectives and role of the water pollution control administration on water quality standards.

467

Are fertilizers creating pollution problems.

468

Effect of agriculture on nitrate pollution of groundwater.

469

Improved GLC method for s-triazine residue determination.

498

WATER TREATMENT

Application of insecticides to paddy water for more effective rice pest control.

205

WAXES

Lipid metabolism and function in insects.

92

WEATHER

Tachinidae catch in the Swiss Jura, using tent traps.

30

The occurrence of the important causes of damage to cultivated plants in Austria during 1967.

196

The influence of the sowing time on the intensity of attack by the panicle generation of frit fly (*Oscinella frit* L.).

288

Slugs cause damage in Ohio cornfields.

328

WEED CONTROL

Weed control for the home garden.

306

Aquatic weed control.

307

Proposed program for accelerated weed control in Wyoming.

311

Chemical control of pigweed. Patent 3,408,176.

315

Weed biology - A future.

321

Sainfoin - a dryland forage crop for Montana.

322

Apparent sap velocities in big sagebrush as related to nearby environment.

573

WEEDS

Effect of topsoil deepening on weed infestation of following crops.

310

Studies of the influence of some predominant weeds on the yield pattern of spring barley.

313

The state of weeds when applying herbicides and insecticides in corn fields.

318

Control of Dalmatian toadflax.

320

Weed biology - A future.

321

We Squashed the weeds.

326

A guide to chemical weed control in tropical and subtropical fruit and nut crops in Hawaii.

327

WHEAT

Triticale in 1967.

225

Physiological races of *Puccinia striiformis* in the wheat of Iran.

246

The effect of sowing dates on the reactions of six wheat strains to stem rust.

248

Resistance power of the Austrian winter wheat assortment against dwarf bunt (*Tilletia controversa* Kuhn).

264

The Hessian fly.

281

Morphological changes in wheat caused by the action of chlorocholinechloride-CCC.

524

Studies on wheat plants using ¹⁴C-labelled compounds. XXII. Incorporation into wheat protein.

536

The in vitro and in vivo oxidation and hydrolysis of malathion by wheat grain esterases. (abstract).

566

WHITE CLOVER

Varietal resistance to clover rot in white clover.

217

WILT

Verticillium wilt in the tomato cultures of the Valais.

231

Control of race 2 *Fusarium* of tomatoes.

237

WINGS (INSECTS)

The control of polymorphism in aphids.

115

WOOD DECAY

Decay of rubber wood in a replanting and its effect on root disease.

245

WOODEN PILES

Timber. *Tetrameles nudiflora* R., resistant to teredid borers in Bombay harbour.

198

WOOL

Gains from worm drenching ewe hoggets in South Canterbury.

445

X-RAYS

Preliminary laboratory study on the effects of X rays on the fertility of the apple moth (*Laspeyresia pomonella* L.).

86

The chitin/protein complexes of insect cuticles.

144

The development of the serosa in male embryos of the mealy bug, *Pseudococcus obscurus* Essig.

181

Contribution to the study of the protection of domestic rabbit against total irradiation by gamma radiation.

407

Studies on the chromatin isolated from the organs of animals received whole-body x-ray irradiation.

423

Effect of ecdysone on the puparium formation in irradiated *Ephesia kuhniella* Z.

532

Note on aflatoxin M₁: Optical and X-ray crystallographic data.

560

XANTHOMONAS MALVACEARUM

Variation in the host-parasite relationship of a crop disease.

218

XANTHOMONAS ORYZAE

Oryzoxymycin, a new antibiotic.

371

XYLEBORUS AFFINIS

Observations on blue-stain and pin-hole beetles and their control, in unpeeled logs of *Pings caribaea* in trinidad.

207

YEASTS

Mastitis prevention and control.

416

ZINC

The status of some micronutrients in healthy Robusta banana plants.

544

ZOOGEOGRAPHY

The Nemouridae of Assam (Plectoptera).

7

Contribution to the knowledge of the lepidoptera fauna of Iran.

8

Sometimes old collections contain surprises. (Noctuidae).

10

Some interesting Rhopalocera of Eastern Spain.

13

Listing of the tritid Noctuidae of France and Belgium.

16

Notes on the fauna of the Armoricaine Mountains.

20

Notes on the fauna of the Armoricaine Mountains.

21

Sialis nigripes Pietet, *Raphidia* (Agulla) *aloyisiana* Costa and *Inocellia keiseri* Aspöck, new for Switzerland. (Neuroptera s.l.).

22

Preliminary report on the distribution in Switzerland of *Boreus hiemalis* L. and *Boreus westwoodi* Hag (Mecoptera, Boreidae).

23

Original descriptions, synonyms and geographical distribution of the species of the Syrphidae (Diptera) family in Chile.

24

Further descriptions of *Halictophagbus pontifex* Fox and *H. regina* Fox (Strepsiptera: Halictophagidae) from Uganda.

25

African termites of the genus *Schedorhinotermes* (Isoptera: Rhinotermitidae) and associated termitophiles (Lepidoptera Tineidae).

28

Four new species and a new genus of Coccidae (Homoptera: Coccoidea) from Africa.

32

Apamea papulatricula Brahm in Belgium. (Noctuidae).

36

SUBJECT INDEX

Hunting at night at Losheimergraben.	37
New species for the Belgian fauna.	39
The Diptera described by W. J. Rainbow from Funafuti Atoll, Ellice Islands.	43
A new Japanese species of <i>Atherigona</i> Rond. (Diptera: Muscidae) reared from sugar-cane.	44
New species of palearctic <i>Torymidæ</i> (Hym. <i>Torymidæ</i>).	49

The biology and ecology of the <i>Rhyparochrominae</i> of New England (Heteroptera: <i>Lygaeidae</i>). I.	50
On the genus <i>Dejanira</i> Thomson (Col. <i>Cerambycidae</i> <i>Cerambycinae</i>).	53
Biological notes on eye-frequenting moths from North Thailand.	71
Biting cycles and parity of the mosquito <i>Mansonia</i> (<i>Mansonioides</i>) <i>uniformis</i> (Theo.) in Ceylon.	146

ZOOGEOGRAPHY

A model of the plant-to-plant movement of aphids. I. Description of the model.	153
Sampling pests and diseases of tea. II.	254
Eelworms in tea: Some problems.	295
Lanjan virus, a new agent isolated from <i>Dermacentor auratus</i> in Malaya.	437 334

BIOGRAPHICAL INDEX

- Aldrich, D T A**
National Institute of Agricultural Botany, Cambridge 217
- Alford, H G**
Agricultural Research Service, Washington, D. C.; Pesticides Regulation Div. 578
- Altman, J**
Colorado State Univ., Fort Collins 293
- Amann, G**
Munich, West Germany 57
- Andel, O M van**
Institute for Biological and Chemical Research On Field; Crops and Herbage, Wageningen, Netherlands 514
- Anders, M**
775 Pacific Street, Morro Bay, Calif. 294
- Andrieu, G**
Centre de Vaccination antirabique de Toulouse, France; Clinique des Maladies Infectieuses 339
- Angus, T A**
Dept. of Forestry, Sault-Ste-Marie, Ontario, Canada; Insect Pathology Research Inst. 58
- Arbuckle, J B R**
Royal Veterinary College, London 330
- Arnold, M H**
Cotton Research Corp., Namulonge, Uganda; Cotton Research Station 218
- Askew, R R**
Manchester Univ., England; Dept. of Zoology 6
- Aubert, J**
Musée Zoologique, Lausanne, Switzerland 7
- Avery, D J**
East Halling Research Station, Kent, England 267
- Baggiolini, M**
Station Federale d'Essais Agricoles, Lausanne, Switzerland; Domaine du Chateau de Changins sur Nyon 268
- Baggiolini, M**
Station Federale d'Essais Agricoles, Lausanne, Switzerland 269
- Bailey, L**
Rothamsted Experimental Station, Harpenden, Herts, England 59
- Baldwin, D E**
Affiliated Laboratories, White Hall, Ill 340
- Barnes, T M**
Medical Research Council, England; Toxicology Research Unit 472
- Barou, J**
I. N. A., Teheran, Iran 8
- Barry, B D**
Ohio Agricultural Research and Development Center, Wooster 328
- Batka, A**
Academy of Sciences, Warsaw, Poland; Institute of Ecology 60
- Battaglini, P**
Napoli Univerita, Italy; Istituto di Biologia generale e Genetica 61
- Baudin, P**
Ecole Nationale Supérieure Agronomique de Tananarive, Madagascar 219
- Baxter, W L**
Nebraska Game, Forestation, and Parks Commission, Lincoln 502
- Bayramoglu, O**
Institute de la Fievre Aphteuse, Ankara, Turkey 341
- Beard, R L**
Connecticut Agricultural Experiment Station, New Haven, 62
- Becker, A**
Beucl, West Germany 220
- Beckwith, A C**
Food and Drug Administration, Washington, D. C. 20204; Div. of Food Chemistry 451
- Behrens, R**
Minnesota Univ.; Dept. of Agronomy and Plant Genetics 303
- Bennett, W H**
Utah State Univ. of Agriculture and Applied Science, Logan 503
- Beran, F**
Bundesanstalt für Pflanzenschutz, Vienna, Austria 504
- Bessarabow, B F**
Moscow Veterinary Academy, USSR; Faculty of Farming and Diseases 343
- Beyers, E**
Fruit and Food Tech. Research Inst., Stellenbosch, South; Africa 221
- Bigger, M**
Coffee Research Station, Lyamungu, Tanganyika 271
- Biliotti, E**
Inst. Nationale de la Recherche Agronomique, Antibes, France; Station de Zoologie agricole et de Lutte biologique 12
- Billman, D C Jr.**
Pfizer (Chas) and Co., Inc., Terre Haute, Ind. 47808 545
- Bird, L S**
Texas A and M Univ., Coll. Station; Dept. of Plant Sciences 222
- Bisping, W**
Tierärztliche Hochschule, Hannover, West Germany; Inst. für Mikrobiologie und Tierseuchen 344
- Black, S H**
Baylor Univ. Coll. of Medicine, Houston, Tex. 77025; Dept. of Microbiology 63
- Black, S H**
Baylor Univ. Coll. of Medicine, Houston, Tex. 77025; Dept. of Microbiology 64
- Blattny, C**
Chemical Technological Univ., Prague, Czechoslovakia 223
- Bohm, H**
Bundesanstalt für Pflanzenschutz, Vienna, Austria 272
- Bolland, F**
Housse, Liege, Belgium 13
- Bottrill, D E**
Commonwealth Scientific and Industrial Research Organization; Division of Horticultural Research 515
- Bovey, R**
Station Federale d'essais agricoles, Lausanne, Switzerland 224
- Box, P G**
Glaxo Laboratories Ltd., England 345
- Braid, P E**
Department of National Health and Welfare, Ottawa, Canada; Biomedical Unit 505
- Brammer, J D**
U. S. Air Force School of Aerospace Medicine, Box 4323, Brooks Air Force Base, Texas, 78235 65
- Braund, D G**
Kentucky Univ., Lexington; Dept. of Animal Sciences 473
- Bregman, A A**
State Univ. College, New Paltz, N. Y.; Div. of Biological Sciences 181
- Brinsfield, T H**
U S Dept of Agriculture, Beltsville, Md, 20705; Agriculture Research Service; Animal Husbandry Research Division; Dairy Cattle Research Branch 346
- Brod, G**
Pflanzenschutzamt Freiburg i. Br., West Germany 331
- Brown, G M**
Agricultural Research Service, Ames, Iowa; Animal Health Div. 347
- Bryant, E H**
Kansas Univ., Lawrence; Dept. of Entomology 66
- Brzeski, M W**
Institute Warzywnictwa, Skierniewice, Poland 297
- Burgerjon, A**
I. N. R. A., La Minière par Versailles, France; Station de Recherche et de Lutte Biologique et de Bio; Coenotique 67
- Burgerjon, A**
I. N. R. A., La Minière par Versailles, France; Station de Recherches de Lutte Biologique et de Biocoen; Otique 68
- Bursell, E**
Rhodesia and Nyasaland Univ. Coll., Salisbury, Rhodesia; Dept. of Biological Sciences 69
- Burt, E T**
Newcastle-upon-Tyne Univ., England; Dept. of Zoology 70
- Buttiker, W**
Ciba Ltd., Basle, Switzerland 71
- Cabrey, E A**
Agricultural Research Service, Ames, Iowa; Animal Health Div. 348
- Capek, M**
Forstliche Versuchsanstalt, Banská Stávnica, Czechoslovakia 72
- Carey, W F**
Rutgers - The State Univ., New Brunswick, N. J. 08903; Dept. of Agricultural Chemistry 474
- Carlstrom, A A**
Chevron Chemical Co., 940 Hensley Street, Richmond, Calif.; 94804 549
- Carlstrom, A A**
Chevron Chemical Co., 940 Hensley Street, Richmond, Calif.; 94804 550
- Carlton, W W**
Purdue Univ., Lafayette, Ind.; Dept. of Veterinary Physiology and Pharmacology 349
- Caron, P E**
Materials Research Weyerhaeuser Co., Longview, Wash. 572
- Carriker, M A**
Smithsonian Institution, Washington, D. C.; Department of Entomology 18
- Carroll, E T**
Food Preservation Research Lab., Hamilton, Brisbane, Australia 454
- Carroll, L H**
Elanco Products Company 350
- Carter, E N**
Manitoba Univ., Winnipeg; Dept. of Plant Science 225
- Cassidy, D R**
Agricultural Research Service, Ames, Iowa; Animal Health Div. 351

BIOGRAPHICAL INDEX

Chakravarti, S S

- Chakravarti, S S**
Bengal Immunity Research Institute, Calcutta-17,
India 551
- Chen, P H**
Macdonald Coll McGill Univ., Montreal, Quebec,
Canada 332
- Chen, P S**
Zurich Univ., Switzerland; Inst. of Zoology and
Comparative Anatomy 73
- Church, R P**
St. Joe River Soil Conservation District 304
- Coleman, V R**
Georgia Univ., Athens, Ga.; Extension Service 273
- Colglazier, M L**
U S Dept of Agriculture, Beltsville, Md, 20705;
Agricultural Research Service; Animal Disease and
Parasite Research Division; Beltsville Parasitologi-
cal Laboratory 439
- Colvin, H J**
Louisiana State Univ., Baton Rouge; Dept. of
Biochemistry 353
- Colwell, W M**
Georgia Univ., Athens; Poultry Disease Research
Center 354
- Corgan, J N**
New Mexico State Univ., Las Cruces. 517
- Costantino, G**
Osservatorio per le Malattie delle Pianta di Catan-
zaro., Italy 274
- Courtney, A D**
Ministry of Agriculture, Ireland; Field Botany
Research Division 305
- Dadd, R H**
California Univ., Berkeley; Dept. of Entomology
and Parasitology 75
- Darley, E F**
California Univ., Riverside 193
- Davidson, J B**
Merke Sharp and Dohme Ltd., Hoddesdon, Herts,
England 440
- Davidson, R L**
Commonwealth Scientific and Industrial Research
Organ; Ization, Armidale, New South Wales, Aus-
tralia; Div. of Plant Industry 76
- Debonder, R**
Institut Pasteur, Paris, France; Laboratoire des
Polyosides 77
- Dennis, D J**
Horticultural Research Centre, Levin, New Zea-
land 518
- Devos, A**
Ecole Veterinaire de Gand Maladies Contagieuses
et Path; Ologie Aviaire, France 355
- Dinther, J. B. M. van**
Agricultural University Wageningen, Netherlands;
Laboratory of Entomology 79
- Djulizibaric, T**
Zorka Institut, Sabac, Yugoslavia 227
- Dodds, R P**
Texas University, Dallas; Southwestern Medical
School; Dept. of Surgery 1
- Edgington, L V**
Guelph Univ., Ontario, Canada 519
- Eglin-dederling, W**
Basel, Switzerland 22
- Eglin-dederling, W**
Basel, Switzerland 23

- Etcheverry, M**
Chile Univ., Santiago; Centro de Estudios En-
tomologicos 24
- Etcheverry, M**
Chile Universidad, Santiago; Centro de Estudios
Entomologicos 81
- Etcheverry, M**
Chile Universidad, Santiago; Centro de Estudios
Entomologicos 82
- Evlakhova, A A**
Institute for Plant Protection, 42 Herten Street,
Lenin; Grad, USSR. 83
- Faleon, L A**
California Univ.; Div. of Entomology 276
- Fastier, L B**
Tasman Vaccine Lab., Upper Hutt, New Zealand;
Virus Research Dept. 356
- Faucheuy, L J Jr.**
Food and Drug Administration, 423 Canal Street,
New Orleans; La. 70130 476
- Faye, P**
Ecole Nationale Veterinaire d'Alfort, France;
Chaire de Pathologie du betail 357
- Fedorintchik, N S**
National Institute for Plant Protection, Leningrad,
USSR. 229
- Fellows, O N**
Agricultural Research Service, Greenport, Long
Island, N. Y.; Plum Island Animal Disease Labora-
tory 358
- Ferencik, M**
Central State Veterinary Inst., Bratislava,
Czechoslovakia 507
- Feron, M**
Centre de Recherches agronomiques du Sud-est;
Station de Zoologie 84
- Ferriere, C**
Museum d' Histoire Naturelle, Geneve, Switzer-
land 85
- Finco, D R**
Minnesota University, St. Paul; Dept. of Veterinary
Medicine 359
- Fischer, H**
Pflanzenschutzamt des Landes Schleswig - Holstein 195
- Fossati, A**
Station Federale d'Essais Agricoles, Lausanne,
Switzerland; Domaine de Changins sur Nyon 86
- Foster, A E**
North Dakota State Univ.; Dept. of Agronomy 520
- Foster, J**
Tropical Pesticides Research Institute, Arusha,
Tanzania 308
- Franz, J M**
Inst. fuer Biologische Schaedlingsbekaempfung,
Kranich; Steiner Strasse 61, Darmstadt, West Ger-
many 87
- Franz, J M**
Inst. fuer Biologische Schaedlingsbekaempfung,
Kranich; Steiner Strasse 61, Darmstadt, West-ger-
many 88
- Free, J B**
Rothamsted Experimental Station, Harpenden,
Hertfordshire; England 89
- Frey, M L**
Iowa State Univ., Ames; Veterinary Medical
Research Inst. 360
- Friend, J**
Hull University; Dept. of Botany 521

- Funada, T**
Katakura Sericultural Experiment Station, Matsu-
moto, Nagano; Ken, Japan 182
- Galichet, P F**
I.R.C.T. Republique du Tchad; Station de Tikem 90
- Geissinger, H D**
Royal Veterinary College, London N.w. 1, En-
gland; Department Of Pathology 362
- Gerlach, H**
Ludwig-Maximilians-Univ., Muenchen, Germany;
Inst. fur Krankheitsendes Haus-Und Wilgefugels 364
- Giacomelli, M**
Centro di Studi Nucleari della Casaccia, South
Maria di; Galeria, Roma, Italy.; Agricoltura del C.
N. E. N.; Laboratorio per le Applicazioni 554
- Gibson, N H E**
Leeds Univ., England; Dept. of Agriculture 91
- Gifford, G F**
Renewable Resources Center, Reno, Nevada 573
- Gilbert, L I**
Northwestern Univ., Evanston, Ill.; Dept. of Biolog-
ical Sciences 92
- Gindrat, D**
Station Federale d'Essais Agricoles, Lausanne,
Switzerland 231
- Gindrat, D**
Station Federale d' Essais Agricoles, Lausanne,
Switzerland 232
- Glaeser, G**
Bundesanstalt fur Pflanzenschutz, Vienna, Austria 196
- Glaeser, G**
Bundesanstalt fur Pflanzenschutz, Vienna, Austria 197
- Gleichen, R**
Celle, West Germany 93
- Gopal, N H**
Central Coffee Research Inst., Chikmagalur Dis-
trict, Mysore; State, India; Coffee Research Station
P. O. 522
- Gordon, J**
Ghana Univ., 309
- Gould, H J**
National Agricultural Advisory Service, Coley
Park, Reading; England 277
- Grahneis, H**
Hygieneinstitut, Halle, East Germany 365
- Greathead, D J**
Commonwealth Inst. of Biological Control, P. O.
Box 7065; Kampala, Uganda 25
- Greathead, D J**
Commonwealth Inst. of Biological Control, P. O.
Box 265; Kampala, Uganda 26
- Green, A A**
Agricultural Research Council, Bucks England;
Pest Infestation Laboratory 96
- Griffin, D M**
Sydney Univ., Australia; Dept. of Agricultural
Botany 523
- Grupce, R**
Faculty of Agriculture and Forestry, Skopje, Yu-
goslavia 524
- Guiglia, D**
Museo Civico di Storia Naturale, Genova, Italy 27
- Gullon, J-C**
Institut Pasteur, Paris, France; Service de
Microbiologie Animale 366

BIOGRAPHICAL INDEX

Lagnel, M

- Guthrie, R K
Texas Coll. of Arts and Industries, Kingsville; Dept.
of Biology 367
- Hackman, R H
Commonwealth Scientific and Industrial Research;
Organization, Canberra, Australia 97
- Hall, H E
Public Health Service, 222 East Central Parkway,
Cincinnati, Ohio 45226; Food Microbiology 455
- Hall, R A
New South Wales Dept. of Agriculture, Australia;
Div. of Animal Industry 368
- Hall, R E
Wisconsin Univ.; Univ. Extension 369
- Hameed, S F
Indian Agricultural Research Inst., Delhi-12, India;
Div. of Entomology 298
- Hamilton, R M G
University of Western Ontario, London, Canada;
Dept. of Biochemistry 370
- Harant, H
Montpellier Univ., France; Faculte de Medecine 185
- Harris, W V
British Museum (Natural History), London, En-
gland; Termite Research Unit 28
- Harvey, W R
Massachusetts Univ., Amherst; Dept. of Zoology 98
- Hashimoto, T
Institute of Microbial Chemistry, Shinagawa-ku,
Tokyo, Japan 371
- Haus, J B
Penick (S. B.) and Co., 215 Watchung Avenue,
Orange, N. J.; 07050; Research Lab. 557
- Hayes, B W
Everglades Experiment Station, Belle Glade 3
- Hecq, J
Mont-sur-Marchienne, Hainaut, Belgium 29
- Heimpel, A M
Agricultural Research Service, Beltsville, Md.; En-
tomology Research Division 99
- Hellberg, H
National Pharmaceutical Lab., Stockholm 60,
Sweden; Chemical Dept. 558
- Henniger, H
Deutsche akademie der Landwirtschaften, Berlin,
East, Germany 525
- Herrera, J
Chile Universidad, Santiago; Centro de Estudios
Entomologicos 101
- Herting, B
Commonwealth Institute of Biological Control,
Delemont, Switzerland 30
- Herzog, R
Institut fuer Acker-und Pflanzenbau Muencheberg,
1278; Wilhelm Pieck Strasse 72, East Germany 310
- Heyns, A J
Fruit and Food Tech. Research Inst., Stellenbosch,
South; Africa 233
- Hikino, H
Tohoku University, Sendai, Japan; School of
Medicine; Pharmaceutical Institute 102
- Hinton, H E
Bristol Univ., England; Dept. of Zoology 31
- Hirai, T
Nagoya Univ., Japan; Faculty of agriculture 279
- Hiraoka, T
Kyoto Univ., Japan; Dept. of Botany 526
- Hodgson, C J
Wye Coll., Ashford, Kent, England 32
- Holst, E M
Sheridan, Wyo. 311
- Horie, S
Kyoto Univ., Otsu, Japan; Otsu Hydrobiological
Station 559
- Hovell, G J R
Wellcome Veterinary Research Station, Frant, Sus-
sex 372
- Huculak, S
Polish Academy of Science, Warsaw; Zoological
Institute, 103
- Huger, A
Biologische Bundesanstalt fur Land- und Forst-
wirtschaft; Darmstadt, West Germany; Institut fur
Biologische Schadlingsbekampfung 104
- Hughes, K L
Sydney Univ., Camden, New South Wales, Aus-
tralia; Dept. of Veterinary Medicine 373
- Hurpin, B
I.N.R.A. Lab. de Lutte Biologique, La Miniere,
France 105
- Hutchinson, T C
Newcastle University upon Tyne; Dept. of Botany 234
- Hybasek, J
Prague-West Central Research Inst. of Livestock
Produc; Tion, Uthrineves, Czechoslovakia; District
Veterinary Station 235
- Ignoffo, C M
Agricultural Research Service, Brownsville, Texas;
Antomology Research Division 106
- Iizuka, T
Hokkaido Univ., Sapporo, Japan 107
- Ingram, W R
Department of Agriculture, Uganda 280
- Isakova, N P
Institute for Plant Protection, Leningrad, USSR 108
- Itzerott, H
Grunstadt, Germany 478
- Izawa, H
Kitasato Institute, Kashiwa City, Chiba Prefecture,
Japan; Research Center for Veterinary Science 375
- Jenkins, R
Economic Research Service; Farm Production
Economics Div. 574
- Jenney, E W
Agricultural Research Service, Ames, Iowa;
Animal Health Div. 376
- Johnson, J R
South Dakota University, Newell; Newell Irrigation
and Dryland Field Station 312
- Johnston, C O
U. S. Dept. of Agriculture; Agricultural Research
Service; Crops Research Division 236
- Jones, F T
Agricultural Research Service, Albany, Calif.
94710; Western Regional Research Lab. 560
- Jones, J P
Gulf Coast Experiment Station, Bradent On, Fla. 237
- Jordan, A M
Bristol Univ., Langford, England; Tsetse Research
Lab. 109
- Joubert, L
Ecole Nationale Veterinaire de Lyon, France;
Maladies Contagieuses et Zoonoses 377
- Joyce, B G
Dunedin, New Zealand 441
- Kadkol, S B
Central Food Technological Research Inst.,
Mysore-2, India; Infestation Control and Pesticides 561
- Kanarek, A D
Wellcome Research Laboratories, Beckenham,
Kent 378
- Karande, A A
Naval Dockyard, Bombay 1., India; Naval Chemi-
cal and Metallurgical Laboratory 198
- Kavanagh, T
Agricultural Inst., Kinsealy, Dublin, Ireland 238
- Khalifa, M D E
Khartoum Univ., Sudan; Dept. of Botany 527
- Khanna, S G S
U. P. Agricultural University, Pantnagar, Dist.
Nainital 239
- Kiesling, R L
North Dakota State Univ.; Dept. of Plant Pathology 240
- Kilby, B A
Leeds Univ., England; Dept. of Biochemistry 110
- Kim, K H
Scul National Univ., Korea; Dept. of Agronomy 529
- Klimmer, O R
Bonn, West Germany 509
- Kluge, J P
Agricultural Research Service, Ames, Iowa; Na-
tional Animal Disease Laboratory 380
- Koshimizu, K
Kyoto University, Japan; College of Agriculture;
Dept. of Food Science 199
- Kotarski, A
Instytut Przemyslu Organicznego, Warszawa, Po-
land 562
- Koval, C
Wisconsin Univ., Madison 241
- Kramer, J P
Illinois Natural History Survey, Urbana 111
- Krezdorn, A H
Florida Univ., Gainesville, Fla.; Dept. of Fruit
Crops 530
- Krieg, A
Biologische Bundesanstalt fur Land- und Forst-
wirtschaft; Darmstadt, West Germany; Institut fur
Biologische Schadlingsbekampfung 112
- Kroger, M
Pennsylvania State University, University Park;
Dept. of Dairy Science 480
- Kumar, S
Udaipur Univ., India; Agricultural Experiment Sta-
tion 531
- Kuzin, A M
Academy of Sciences of the United Soviet So-
cialist; Republic; Institute of Biological Physics;
Dept. of Radiobiology 532
- Lafever, H N
Ohio Agricultural Research and Development
Center, Wooster 281
- Lagnel, M
Paris, France 34

BIOGRAPHICAL INDEX

Longley, P A

Langley, P A
International Atomic Energy Agency, Kaerntner
Ring 11; Vienna 1, Austria 113

Lanotte, G
Institut Bouisson-Bertrand, Montpellier, France 383

Larkin, P J
Beecham Research Laboratories, Surrey 443

Le Gal, M
Museum National d'Histoire Naturelle, Paris
France 200

Leatherdale, D
Whitchurch, Pangbourne, Berkshire, England 201

Lebeuf, F
Institut Pasteur de Lyon, France 384

Lecadet, M
Institut Pasteur, Paris, France; Laboratoire des
Poliosydes 114

Lee, C
Seoul National Univ., Korea; Dept. of Agronomy 533

Lee, L R
Agricultural Research Service, Ames, Iowa;
Animal Health Div. 385

Lee, L R
Agricultural Research Service, Ames, Iowa;
Animal Health Div. 386

Lees, A D
Agricultural Research Council, Cambridge, En-
gland; Unit of Insect Physiology 115

Lefkovitch, L P
Canada Dept. of Agriculture, Ottawa, Canada;
Statistical Research Service 116

Legner, E F
California Univ. 117

Legrain, A
Argenteau, Liege, Belgium 35

Legrain, A
Argenteau, Liege, Belgium 37

Legrain, A
Argenteau, Belgium 38

Legrain, A
Argenteau, Belgium 39

Leonide, J-c
Faculte de Marseille, France; Laboratoire de
Zoologie generale 118

Lepine, P
Institut Pasteur, Paris, France 387

Lesslie, I W
Central Veterinary Lab., Weybridge, England 388

Levi, C P
General Foods Technical Center, White Plains, N.
Y. 10642 456

Lincke, G
Friedrich Schiller Univ., Jena, East Germany; In-
stitut fuer Acker-und Pflanzenbau 313

Ling, K C
International Rice Research Inst., Los Banos,
Laguna; Philippines 119

Lipa, J J
Institute of Plant Protection, Poznan, Poland;
Laboratory of Biological Control 120

Litkenhous, C J
Food and Drug Administration, Washington, D. C.
20204; Div. of Microbiology 457

Lojo, S G
Philsguin Tarlac Experiment Station, Philippines 329

Lom, J
Institute of Parasitology of the CSAV, Vinicna 7.;
Prague 2, Czechoslovakia 121

Lom, J
Institute of Parasitology of the CSAV, Vinicna 7.;
Prague 2, Czechoslovakia; Dept. of Protozoology 122

Lorenzen, P
Staatliches Veterinar-Untersuchungsamt, Frank-
furt am Main.; West Germany 389

Loux, E
Institute de Botanique, Strassbourg, France;
Laboratoire de Cecidologie 40

Luedke, A J
Agricultural Research Service, Denver, Col. 390

Lutz, P E
North Carolina Univ., Greensboro, N. C.; Dept. of
Biology 123

Lysenko, O
Institute of Entomology C. S. A. V., Prague,
Czechoslovakia; Dept. of Insect Pathology 124

MacMillan, J
Bristol Univ., England; Dept. of Organic Chemistry 534

Madsen, H
Canada Dept. of Agriculture, Summerland, British
Columbia; Head Entomology Section 282

Maheshwari, R
Wisconsin University, Madison; Dept. of Plant
Pathology 242

Malina, M
Velsicol Chemical Corp., 341 East Ohio Street,
Chicago, Ill.; 60611 563

Manuel, E A
Department of Agriculture and Fisheries, Bermuda 202

Marenaud, C
Station du Recherche Arboriculture Fruitiere,
Point-de-la; Maye, France 535

Mariani, M
Palermo Universita, Italy; Istituto d igiene 186

Marshall, C L
New South Wales Univ., Kensington, Sidney, Aus-
tralia; School of Microbiology 564

Masri, M S
Agricultural Research Service, Albany, Calif.
94710; Western Regional Research Lab. 458

Mathys, G
Station Federale d'essais agricoles, Lausanne, Swit-
zerland 125

Matthaeus, W
Bundesforschungsanstalt fur viruskrankheiten der
Tiere.; Tubingen am Neckar, West Germany 391

McConnell, W B
Saskatchewan Univ., Regina, Canada; Dept. of
Chemistry 536

McGhee, R B
Georgia Univ., Athens; Dept. of Zoology 392

McLeod, C C
Department of Agriculture, Timaru, New Zealand 445

McLeod, R W
Dept. of Agriculture, Rydalmere, New South Wales 299

Meier, W
Eidgenossische landwirtschaftliche Versuchsanstalt;
Zurich-Oerlikon, Switzerland 127

Meinecke, C
Karl Marx Univ., Leipzig, East Germany; Inst. fur
Veterinar-Pharmakologie und Toxikologie 334

Mengeling, W L
U S Dept of Agriculture, Ames, Iowa, 50010;
Agricultural Research Service; National Animal
Disease Laboratory; Animal Disease and Parasite
Research Division 393

Meyer, H
Tierarztliche Hochschule, Hannover, West Ger-
many; Inst. fur Tierzucht-und Verebungsforschung 394

Mickovski, M
Agricultural Faculty of Skopje, Yugoslavia 537

Miller, J P
Washington State University; College of Agricul-
ture; Cooperative Extension Service 283

Miller, P L
Oxford Univ., England; Dept. of Zoology 128

Misra, R V
Government Agricultural Coll., Kanpur, India;
Dept. of Agricultural Chemistry 538

Moha, C
Laboratoire de Cyto Pathologie Vegetale, Nantes,
France 129

Monro, J
U L T I M O; New South Wales Institute of
Technology, Australia 41

Morohoshi, S
Tokyo Univ. of Agriculture and Technology,
Fuchu-shi; Tokyo, Japan; Faculty of Agriculture 130

Moubry, R J
Wisconsin Dept. of Agriculture, Madison; General
Lab. Div. 481

Muenster, J
Station Federale d'Essais Agricoles, Lausanne,
Switzerland 244

Muhm, R L
Agricultural Research Service, Ames, Iowa;
Animal Health Div. 395

Muller-Kogler, E
Biologische Bundesanstalt fur Land- und Forst-
wirtschaft; Darmstadt, West Germany; Institut fur
biologische Schadlingsbekampfung 131

Nagy, Z
Hungarian Academy of Sciences, Budapest; Veteri-
nary Medical Research Institute 396

Narahashi, T
Chicago Univ., Ill.; Dept. of Physiology 132

Needham, A E
Oxford University, England; Dept. of Zoology 133

Negoro, K
Kyoto Univ., Otsu, Japan; Otsu Hydrobiological
Station 204

Nelson, H A
Agricultural Research Service, Ames, Iowa;
Animal Health Div. 483

Neururer, H
Bundesanstalt fur Pflanzenschutz, Vienna, Austria 317

Neville, A C
Agricultural Research Council, Oxford, England;
Unit of Muscular Mechanisms and Insect Physiolo-
gy 134

Newsam, A
Rubber Research Inst. of Malaya, Kuala Lumpur;
Pathology Div. 245

Nolle, H H
Aglukon-Gesellschaft mbH., Dusseldorf, West Ger-
many 135

Norris, J R
Shell Research Ltd., Sittingbourne, Kent, England 136

BIOGRAPHICAL INDEX

Skuhrava, M

Novitzky, S Neulingasse 42/26 Wien III/40, Austria	42	Quednau, W Biologische Bundesanstalt fuer Land-und Forstwirtschaft.; Berin-dahlem; Inst. fuer Zoologie	45	Sarlet, L G Ensival, Belgium	47
Nucifora, A Universita degli Studi di Catania, Italy; Istituto di Entomologia Agraria	137	Ragelis, E P Food and Drug Administration, Washington, D. C. 20204; Div. of Food Chemistry	489	Sarlet, L G Ensival, Belgium	147
Oliver, J H California University, Berkeley; Dept. of Entomology and Parasitology	183	Ragland, W L Washington State University, Pullman; Dept. of Veterinary Pathology	405	Sarlet, L G Ensival, Belgium	148
Onesto, E Napoli Universita, Italy; Istituto di Zoologia	138	Rao, T S Andhra Veterinary Coll., Tirupati, India	140	Sautter, J H College of Veterinary Medicine, Saint Paul, Minn. 55101; Dept. of Veterinary Pathology and Parasitology	410
Oostendorp, D Research and Advisory Inst. for Field Crops and Grassland; Husbandry, Wageningen, Netherlands	446	Rathore, Y S Utter Pradesh Agricultural Univ., Pantnagar, Dist. Naini; Tal, India	141	Schildknecht, H Heidelberg Univ., West Germany; Organisch-Chemisches Institut	149
Ott, D E California Univ. Citrus Research Center, Riverside 92502; Dept. of Entomology	485	Ray, H C Federal Water Pollution Control Administration, Washington.; D. C.	467	Schimmel, D Agricultural Research Service, Ames, Iowa; Animal Disease and Parasite Research Division	411
Palmer, N J Food and Drug Administration, Washington, D. C. 20204; Div. of Food Chemistry	486	Raynaud, J P Station Experimentale Pfizer-Clin-Amboise (37), France	406	Schmittle, S C Georgia Univ., Athens; Poultry Disease Research Center	412
Parry, R T Bernard Matthews Ltd.	402	Reed, W T Rutgers-The State Univ., New Brunswick, N. J.; Dept. of Entomology and Economic Zoology	249	Schulte, S J Microbiological Sciences, Inc., Saw Mill River Rd., Yonkers.; N. Y. 10701	461
Patel, H K B. A. Coll. of Agriculture, Anand; Dept. of Entomology	285	Reira Da Silva, L H Institut Pasteur, Paris, France; Service de Genetique cellulaire	184	Schulze, G Uhlendstrasse 6, 2 Hamburg 22, West Germany	210
Pathak, M D International Rice Research Inst., Los Banos, Laguna, Phil; Ippines	205	Richards, B N University of New England, Armidale, New South Wales.; Australia; Dept. of Botany	539	Scott, P M Canada Dept. of National Health and Welfare, Ottawa.; Ontario; Food and Drug Directorate	462
Patil, B P Agricultural Research Station, Mahableshwar	248	Rico, A G Ecole Nationale Veterinaire de Toulouse, France; Chimie Biologique et Medicale	407	Scott, R G Health Branch, Parliment Buildings, Victoria, British; Columbia, Canada	463
Pawsey, R G Commonwealth Forestry Inst., Oxford, England	207	Robert, J A Agricultural Research Service, New Orleans, La. 70119; Southern Regional Research Lab.	460	Seidlova, F Czechoslovak Academy of Sciences, Ke dvoru 16, Praha; Institute of Experimental Botany	540
Pelletier, M Centre National de la Recherche Scientifique, Garches.; Hautes de Seine, France; Service de Pathologie experimentale	403	Roberts, H Federal Dept. of Forest Research, Ibadan, Nigeria	286	Service, M W Nature Conservancy, Abbots Ripton, Huntingdonshire; Monks Wood Experiment Station	151
Pence, R J California Univ., Los Angeles; Dept. of Agricultural Sciences	577	Robertson, L Public Health Lab., Preston, England	408	Shaw, A F Montana Extension Service	322
Peters, E G I. N. E. C., Brussels, Belgium; Institut Europeen de Cancerologie	466	Roehrich, R I. N. R. A., La Grande Ferrade au Pont de la Maye; (Gironde), France; Station de Zoologie Agricole du Sud-Ouest	142	Shaw, J Durham Univ., Newcastle-on-Tyne, England; Dept. of Zoology	152
Pivar, G Senior Agricultural School, Osijek, Yugoslavia	318	Rogers, P A State Dept. of Public Health, Berkeley, Calif.; Bureau of Vector Control	452	Sherman, K C Agricultural Research Service, Ames, Iowa; Animal Health Div.	413
Pivnick, H Food and Drug Directorate, Tunney's Pasture, Ottawa.; Ontario, Canada; Rescarch Labs.	459	Romanyk, N Servizio de Plagas Forestales, Madrid, Spain	143	Shimizu, T. National Institute of Animal Health, Tokyo, Japan; First Research Division	414
Polizu, A Institut de Recherches de la Protection des Plants.; B dul Narasti 61, Bucharest, Rumania	487	Rose, J H Central Veterinary Laboratory, Weybridge, England	447	Shimmon, J Hart-Carter Pacific Corp.	570
Polony, R Agricultural Coll., Kosice, Czechoslovakia; Veterinary Faculty	404	Ross, J G Veterinary Research Laboratories, Stormont, Ireland	448	Shiyomi, M National Institute of Agricultural Sciences, Tokyo, Japan; Div. of Statistical Research	153
Pont, A C British Museum (Natural History), London, England; Dept. of Entomology	43	Rudall, K M Leeds Univ., England; Astbury Dept. of Biophysics	144	Silva Fernandes, A M S Laboratorio de Fitofarmacologia, Oeiras, Portugal	491
Pont, A C British Museum (Natural History), London, England; Dept. of Entomology	44	Ruperez, A Servicio de Plagas Forestales, Madrid, Spain; Laboratorio de Patologia de Insectos	145	Simons, M D Agricultural Research Service; Crops Research Div.	256
Pospisil, L Czechoslovak Academy of Sciences, Prague 1; J. Heyrovsky Institute of Polarography	565	Sagar, G R University Coll. of North Wales, Bangor; Dept. of Agricultural Botany	321	Singh, R P College of Veterinary Medicine, Hissar, Haryana, India	416
Pramanik, L M Indian Lac Research Institute, Namkum; Division of Entomology	139	Sahni, M L I. A. R. I., New Delhi; Division of Mycology and Plant Pathology	253	Sivan, J Service Pasteur, Marseille, France; Laboratoire Municipal de Biologie et de Chimie	417
Py, C Institut Francais de Recherches Fruitières Outre-Mer.; Paris, France	319	Samarawickrema, W A Medical Research Inst., Colombo, Ceylon	146	Skuhrava, M Czechoslovak Entomological Society, Prague	48

BIOGRAPHICAL INDEX

Smilde, K W

- Smilde, K W
Institute for Soil Fertility, Haren-Groningen,
Netherlands 257
- Smirnoff, W A
Laboratoire de Recherches Forestieres, Sillery,
Quebec, Canada 154
- Smith, C E G
Microbiological Research Establishment, Porton,
Nr. Salisbury, Wiltshire 437
- Smith, D B
State College, Miss; Boll Weevil Research Lab. 571
- Smith, D S
Cambridge Univ., England; Dept. of Zoology 155
- Smith, G E
Missouri Univ., Columbia 468
- Smith, P C
Southeast Asian Treaty Organization Medical
Research Laboratory, Tientsin, Thailand 419
- Smith, V K
Forest Service, Gulfport, Miss., 39501; Wood
Products Insect Lab. 492
- Snyder, J W
Eureka College, Eureka, Ill 420
- Sokal, R R
Kansas Univ., Lawrence; Dept. of Entomology 156
- Sol, R
Inst. fuer Pflanzenpathologie und Pflanzenschutz,
Goettingen, West Germany 157
- Sousa Lobo, M J de
Laboratorio da Defesa Fitossanitaria dos Produtos
Armazenados, Ados. 493
- Spittstoesser, C M
New York State Agricultural Experiment Station,
Geneva; 14456 158
- Stankovic, A
Faculty of Agriculture, Novi Sad, Yugoslavia 159
- Stary, P
Czechoslovak Academy of Science, Prague; In-
stitute of Entomology 160
- Stein, R
Food and Drug Administration, Washington, D. C.
20204; Div. of Microbiology 453
- Stein, W
Biologische Bundesanstalt fuer Land-und Forst-
wirtschaft, Darmstadt, West Germany; Institut
fuer Biologische Schaedlingsbekämpfung 161
- Steinhaus, E A
California Univ., Irvine; Division of Biological
Sciences 162
- Stenherg, H
State Institute for Veterinary Medicine, Helsinki,
Finland 422
- Stewart, B A
Department of Agriculture, Fort Collins, Colo.;
Agricultural Research Service 469
- Stitt, L L
Nevada Univ., Reno; Agricultural Experiment Sta-
tion 495
- Stritzke, J F
South Dakota State Univ.; Dept. of Agronomy 323
- Su Nam, H
Seoul National Univ., Korea; Dept. of Veterinary
Medicine 423
- Sugahara, M
Illinois Univ., Urbana; Dept. of Animal Science 424
- Suzuki, N
Kyoto Univ., Otsu, Japan; Otsu Hydrobiological
Station 335
- Sweet, M H
Texas A and M Univ., College Station; Dept. of
Biology 50
- Sylvester, N K
Pyrethrum Marketing Board of Kenya; Research
Laboratories 187
- Taniyama, T
Mie Univ., Japan; Faculty of Agriculture 541
- Taylor, G A
Crop Quality Council 287
- Taylor, N W
University of New England, Armidale, New South
Wales; Australia; Dept. of Mathematics 164
- Teague, H S
Ohio Agricultural Research and Development
Center, Wooster 426
- Tennant, B
California Univ., Davis; Dept. of Clinical Sciences 427
- Terry, P J
Tropical Pesticides Research Institute, Arusha,
Tanzania 324
- Tesic, T
Institute for small Grains, Kragujevac, Yugoslavia 288
- Thier, H-p
Erlangen-nuernberg Univ., West Germany; Institut
fuer angewandte Chemie 496
- Thomson, G M
Sugar Experiment Station, South Africa 259
- Thorne, G
South Dakota State University, Brookings; Agricul-
tural Experiment Station 300
- Tindle, R C
Department of the Interior, Columbus, Mo. 65201;
Fish Pesticide Research Lab. 498
- Tominaga, T
National Institute of Agricultural Sciences,
Nishigahara 260
- Torma, L
Montana Dept. of Agriculture, Bozeman 59715;
Feed and Fertilizer Div. 567
- Trainer, D O
Wisconsin Univ., Madison; Dept. of Veterinary
Science 428
- Traub, E
Iran Unit of Near East Animal Health Institute,
P.O. box 656; Tcheran, Iran; Razi Serum and Vac-
cine Institute 429
- Trebbin, H
Pathologisches Inst. der Landeshauptstadt Han-
nover, West Germany 430
- Treharne, K J
Welsh Plant Breeding Station, Aberystwyth, En-
gland 542
- Tschesche, R
Bonn Univ., West Germany; Organisch-
Chemisches Institut 543
- Tschirley, F H
Agricultural Research Service; Crops Protection
Research Branch 214
- Tsukamoto, M
California University, Berkeley; Division of En-
tomology and Acarology 4
- Tuite, J
Purdue Univ., Lafayette, Ind.; Dept. of Botany and
Plant Pathology 261
- Twyford, I T
Windward Islands Banana Research Scheme, Cas-
tles, St. Lucia, West Indies 544
- Uhrizsy, G
Institut for Plant Protection Research, Budapest,
Hungary 165
- Unthank, J E
Shepparton, Australia 289
- Usher, M B
University of Edinburgh, Scotland; Department of
Forestry and Natural Resources 166
- Utsumi, S
Kyoto Univ. of Industrial Arts and Textile Fibers,
Japan; Faculty of Textile Fibers 167
- Vago, C
I. N. R. A., Saint Christol, France; Laboratoire de
Cytopathologie 168
- Vago, C
Inst. National de la Recherche Agronomique,
Saint Christol, France; Lab. de Cytopathologie 169
- Valli, V J
United Fruit Co., La Lima Nueva, Honduras; Div.
of Tropical Research 170
- Van Heek, L A G
Department of Tropical Horticulture, Tatura, Aus-
tralia 325
- Villiers, A
Museum National d'Histoire Naturelle, Paris,
France; Laboratoire d'Entomologie Generale et
Appliquee 53
- Vine, B H
Coffee Research Station, Ruiru, Kenya 262
- Vittal, S M
Regional Research Station, Tindivanam, India 291
- Vosdingh, R A
Fort Detrick, Frederick, Md.; Virus and Rickettsia
Div. 431
- Warlet, J M
Warsage, Belgium 54
- Watanabe, H
Tokyo Univ., Bunkyo-ku, Japan; Faculty of
Agriculture 171
- Wazenski, T J
Food and Drug Administration, 2nd and Chestnut
Streets, Philadelphia, Pa. 19106 464
- Wearing, C H
Dept. of Scientific and Industrial Research, Nelson,
New Zealand; Entomology Div 172
- Weiser, J
Entomological Institut of the Academy, Prague 6,
Na evic; Isti, Czechoslovakia; Laboratory for Insect
Pathology 173
- Weiser, J
Entomological Institute 3f the Academy, Na
evicisti 2; Prague 6, Czechoslovakia; Laboratory
for Insect Pathology 174
- Wenzl, H
Bundesanstalt fuer Pflanzenschutz, Vienna, Austria 292
- White, C A
Biofarm Cor., Wasco, Calif. 175
- Williams, C H
Food and Drug Administration, Washington, D. C.;
Div. of Toxicology Evaluation 512

BIOGRAPHICAL INDEX

Zweep, W Van Der

Williams, H E West Indies Univ., St. Augustine, Trinidad; Dept. of Livestock Science	438	Station	336	Young, H Wisconsin State Univ., La Crosse	499
Williams, I H Canada Dept. of Agriculture, 6660 Northwest Marine Drive.; Vancouver; Research Station	470	Yamanaka, T California University, San Diego; Revelle College; Dept. of Chemistry	434	Zapata, S Chile Universidad, Santiago; Centro de Estudios Entomologicos	180
Williams, J E Agricultural Research Service, Athens, Ga.; Southeast Poultry Research Lab.	433	Yamurias, C I. N. R. A., La Miniere, France; Laboratoire de Lutte biologique	177	Zarkower, A Pennsylvania State University, University Park, 16802; Dept Of Veterinary Science	337
Wilson, D W Guelph Univ., Ontario, Canada	215	Yasuno, M Tokyo Univ., Japan; Dept. of Parasitology	178	Zwatz, B Bundesanstalt fur Pflanzenschutz, Vienna, Austria	264
Wyatt, G R Yale Univ., New Haven, Conn.; Dept. of Biology	176	Yasuno, M Tokyo Univ., Japan; Dept. of Parasitology	179	Zweep, W Van Der Institute for Biological and Chemical Research on Field; and Herbage Crops, Wageningen, Nether- lands	500
Yamamoto, K Kyoto Univ., Otsu, Japan; Otsu Hydrobiological		Yee, W Y J Hawaii Agricultural Experiment Station	327		



AUTHOR INDEX

Adams, F L	409	Boursin, Ch	16	Davidson, R L	76	Gleichauf, R	93
Adler, H E	364	Bovey, R	224	Debonder, R	77	Glozanski, M	159
Aldrich, D T A	217	Bowen, E T W	437	Delaunay, A	403	Goldman, M	427
Alford, H G	578	Box, P G	345	Deming, J M	78	Goldman, M C	94
Altman, J	293	Braid, P E	505	Dennis, D J	518	Gopal, N H	522
Amann, G	57	Brammer, J D	65	Derscheid, L A	323	Gordon, J	309
Andel, O M van	514	Braund, D G	473	Devos, A	355	Gorham, J R	405
Anders, M	294	Bregman, A A	181	Diercks, R	302	Gould, H J	277
Anderson, D P	360	Brickey, P M Jr.	453	Dillard, L H	433	Grahneis, H	365
Anderson, J M	484	Briggs, J D	175	Dinther, J. B. M. va	79	Gratwick, M	95
Anderson, R J	338	Brinsfield, T H	346	Djulizibarie, T	227	Greathead, D J	25
Andrieu, G	339	Brod, G	331	Dodds, R P	1		
Andrilenas, P	574	Bromer, M B	457	Dodin, A	219	Green, A A	96
Angus, T A	58	Browder, L E	236	Dohre, S R	253	Grein, A	555
Anonymous,	301	Brown, A D	564	Doling, D A	217	Griffin, D M	523
579		Brown, C L	376	Dresse, J I	385	Grifo, A P	426
Arbuckle, J B R	330	Brown, G M	347	Drew, J W	553	Grupee, R	524
Arikado, H	541	Brown, L D	473	Duggan, R E	475	Gudevski, A	524
Armstrong, J F	488	Brown, S J	218	Durham, W F	488	Guiglia, D	27
Arnold, M H	218	Brunson, K W	367	Dutta, S K	194	Guillon, J-C	366
Arvay, S	507	Bryant, E H	66	Dworakowska, I	80	Gunther, F A	485
Askew, R R	6	156		Easterday, B C	428	Guthrie, R K	367
Atanasiu, P	387	Brzeski, M W	297	431		Hackman, R H	97
Aubert, J	7	Burchfield, H P	546	Edgington, L V	519	Hackney, R J	556
Aue, W A	498	Burgerjon, A	67	Eglin-dedering, W	22	Haidari, M	278
Avery, D J	267	68		23		Halasa, M	507
Bachthaler, G	302	Bursell, E	69	Eglinton, G	534	Hall, H E	455
Bacr, E F	457	Burt, E C	571	Eichers, T	574	Hall, R A	368
Baggiolini, M	86	Burt, E T	70	Eidson, C S	412	Hall, R E	369
268, 269		Buttiker, W	71	Eisenberg, W V	453	Hall, W M	461
Bailey, L	59	Byass, J B	192	Enzie, F D	439	Halliday, H E	481
Baker, D H	424	Cabrey, E A	348	Erasmus, H D	233	Hameed, S F	298
Baldwin, D E	340	Caldwell, R M	236	Erdman, I E	459	Hamilton, R M G	370
Balogun, R A	166	Callahan, P S	170	Erler, W	411	Hanger, B C	243
Bamdadian, A	246	Callighan, R H	547	Etcheverry, M	24	Hanson, J B	515
Banerjee, B	270	Camprag, D	159	81, 82		Hanson, R P	360
295		Capdeville, P	17	Evans, W	228	Harant, H	185
Banerjee, C K	239	Capek, M	72	Evlakhova, A A	83	Harinasuta, C	178
Barchielli, R	555	Carbrey, E A	385	Falcon, L A	276	Harmsen, H E	446
Barjac, H de	68	386		Famet, A	387	Harris, W V	28
Barksdale, B	188	Carey, W F	474	Farrell, I D	408	Harrison, D L	477
Barnes, T M	472	Carlstrom, A A	549	Fastier, L B	356	Harrold, D	427
Barou, J	8	550		Faucheuy, L J Jr.	476	Harrold, R L	426
Barretto, M P	9	Carlton, W W	349	Faye, P	357	Harvey, W R	98
Barros, M C de	491	Caron, P E	572	Fedorintchik, N S	229	Hashimoto, T	371
Barry, B D	328	Carrasco, J	101	Fellows, O N	358	Haskell, J A	98
Basu, S D	296	Carriker, M A	18	Ferencik, M	507	Hatchett, J H	281
Basu, U P	551	Carroll, E T	454	Fernie, L M	226	Haus, J B	557
Batka, A	60	Carroll, L H	350	Feron, M	84	Hawk, H W	346
Battaglini, P	61	Carter, E N	225	Ferriere, C	85	Hawthorne, J O	547
Baudin, P	219	Casida, J E	4	Fichte, B	435	Hayes, B W	3
Baxter, W L	502	Cassidy, D R	351	Finco, D R	359	Hayes, W J	488
Bayramoglu, O	341	Casterline, J L	512	Fischer, H	195	Heady, H F	314
Beard, R L	62	Catton, W T	70	Fisher, B S	489	Healy, P J	508
Beardsley, D W	3	Chakravarti, S S	551	Forgash, A J	249	Hecq, J	29
Becker, A	220	Chantal, J	363	Fossati, A	86	Heimpel, A M	99
Beckwith, A C	451	Charl, M S	285	Foster, A E	520	Hellberg, H	558
Behrens, R	303	Charton, A	357	Foster, J	308	Henniger, H	525
Bellenger, G J	452	Chastang, S	168	324		Herfs, W	100
Bellhouse, R	450	Chechak, A J	552	Fox, A	574	112	
Benard, R	84	Checkhourina, T A	83	Franz, J M	87	Herrera, J	101
Bennett, W H	503	Chen, P H	332	88		Herting, B	30
Benson, W R	486	Chen, P S	73	Free, J B	89	Herzog, R	310
Beran, F	504	Cherel, J	20	Frey, M L	360	Heskova, A	72
Berczi, I	396	21		Friend, J	521	Hessami, M	429
Berkaloff, A	357	Chirol, C	366	Fukuda, Y	401	Heyns, A J	233
Bernard, C	357	Choudhury, M K	139	Fukui, H	199	Hicks, M	443
Bertok, L	396	Christie, C J	477	Fukunaga, E T	327	Hignett, S L	372
Berzins, J	342	Church, R P	304	Funada, T	182	Hikino, H	102
Bessarabow, B F	343	Clague, D C	352	Galichet, P F	90	163	
Betz, J T	10	Clark, H	545	Gallun, R L	281	Hikino, Y	102
Beyers, E	221	Clarke, J H	516	Garcia, V C	458	163	
Beylot, J-C	366	Coleman, V R	273	Gayford, G W	230	Hildebrandt, A C	242
Bigger, M	271	Colglazier, M L	439	Gee, C D	361	Hill, R	459
Bigot, L	11	Collett, J N	477	Gehrke, C W	498	Hinton, H E	31
Biliotti, E	12	Colvin, H J	353	Geissinger, H D	362	Hirai, T	279
Billman, D C Jr.	545	Colwell, W M	354	Geral, M F	363	Hiraoka, T	526
Bird, L S	222	Common, R H	332	Gerlach, H	364	Hodgson, C J	32
Birn, K J	388	Compton, L E	236	Gerlach, R	2	Holst, E M	311
Bisping, W	344	Connolly, D	459	Giacomelli, M	554	Horie, S	559
Black, S H	63	Cordailart, J-C	366	Gibson, N H E	91	Hosaka, M	171
64		Corgan, J N	517	Giesler, F J	369	Hovell, G J R	372
Blattny, C	223	Cornu, P	244	Gifford, G F	573	Huber, J T	473
Boguleanu, Gh	487	Costantino, G	274	Gigstad, D C	413	Huculak, S	103
Bohm, H	272	Courtney, A D	305	Gilbert, L I	92	Huger, A	104
Bohm, K H	344	Critchett, C I	226	Gilden, M M	457	Hughes, K L	373
Bolay, A	232	Croissant, O	169	Gindrat, D	231	Hugot, R	33
Bolland, F	13	Curtis, C F	109	232		Hull, A C	510
Borker, E	456	Dadd, R H	75	Ginther, B E	567	Hunter, D	450
Bottrill, D E	515	Dahlgren, R B	502	Girard, H C	341	Hurpin, B	105
Bourgogne, J	14	Darley, E F	193	Glaeser, G	196	Hurtik, E	507
15		Davidson, J B	440	197		Hutchinson, G L	469

AUTHOR INDEX

Hutchinson, T C

Hutchinson, T C	234	Lee, C	533	Moore, D J	202	Pospisil, L	565
Ilyasek, J	235	Lee, E W	529	Mori, S	335	Pramanik, L M	139
Ichikawa, Y	167	Lee, K S	560	Morohoshi, S	130	Pryce, R J	534
Ignoffo, C M	106	Lee, L R	385	Mosha, C J	308	Py, C	319
Iizuka, T	107	386		324		Quedna, W	45
Ingram, W R	280	Leeling, N C	473	Mosinska, K	562	Quinby, G E	488
Inui, M	199	Lees, A D	115	Mostert, G C	494	Ragelis, E P	489
Isakova, N P	108	Leffel, E C	346	Moubry, R J	481	Ragland, W L	405
Ito, Y	414	Leikovitche, L P	116	Mraz, A	507	Ramirez, M T	82
Itzerott, H	478	Legner, E F	117	Mucnster, J	244	Rao, B S	245
Izawa, H	375	Legrain, A	35	Muhm, R L	395	Rao, I M	522
Jacob, F	184	36, 37, 38, 39		Mukerjea, T D	284	Rao, T S	140
Jacobson, K H	512	Lehmann, R P	439	Muller-Kogler, E	131	Rathore, Y S	141
James, M J	3	Leonide, J-c	118	Murbach, A	86	Ray, H C	467
Jenkins, R	574	Lepinc, P	387	Murphy, H C	256	Raynaud, J P	406
Jenney, E W	376	Lesslie, I W	388	Murray, M	440	Reedman, D R	426
John, K P	245	Levi, C P	456	Musomi, R C	308	Reed, W T	249
Johnson, C	489	Leyuraz, H	224	Myrdal, G R	481	Reina-Guerra, M	427
Johnson, J R	312	Lincke, G	313	Nagasawa, T	203	Reira Da Silva, L H	184
Johnston, C O	236	Linder, R L	502	Nagy, Z	396	Reis c Sousa, T	491
Jones, F T	560	Ling, K C	119	Nair, N G	523	Rhodes, K J	464
Jones, J H	202	Lipa, J J	120	Nakatomi, K	569	Richards, B N	539
Jones, J P	237	Lippincott, J A	527	Narahashi, T	132	Richter, H	334
Jordan, A M	109	Liska, B J	494	Needham, A E	133	Rico, A G	407
Joubert, L	377	Litkenhous, C J	457	Negoro, K	204	Ricorday, L-H	46
Joyce, B G	441	Liu, S K	420	Ncighbors, R P	315	Robert, J A	460
Kadkol, S B	561	Loftis, W E	392	Nelson, B	316	Roberts, H	286
Kammerer, F J	543	Loit, A	459	Nelson, B C	183	Roberts, R J	76
Kanarek, A D	378	Lojo, S G	329	Nelson, H A	483	Robertson, L	408
Karande, A A	198	Lom, J	121	Nene, Y L	239	Robeson, C D	552
Kavanagh, T	238	122		Neururer, H	317	Robinson, E C	464
Kelly, W A	349	Lomhard, M	377	Neville, A C	134	Robocker, W C	320
Kerdphule, Y	179	Lorenzen, P	389	Newman, J A	410	Roebrich, R	142
Khalifa, M D E	527	Lorgue, G	407	Newsam, A	245	Rogers, P A	452
Khanna, S G S	239	Loux, E	40	Niemann, E	246	Roman, M	487
Kiesling, R L	240	Low, D G	359	247		Romanowski, R R	327
Kilby, B A	110	Lozanovski, R	524	Nishiyama, K	260	Romanyk, N	143
Kim, C M	528	Lozinska, E	524	Nix, M	505	Rosc, J H	447
Kim, K H	529	Luedke, A J	390	Niyomura, M	203	Rosen, W E	553
Kirk, J K	379	Lutz, P E	123	Nolle, H H	135	Rosenwald, A S	364
479		Lysenko, O	124	Nomata, K	425	Ross, J G	448
Kiso, A	279	Macias, W	297	Nomoto, K	163	Rowlands, D G	566
Kitani, K	279	MacMillan, J	534	Norris, J R	136	Rudall, K M	144
Kitano, M	167	Madsen, H	282	Novitzky, S	42	Rumpler, W V	348
Kiyosawa, I	203	Maeda, M	203	Nucifora, A	137	Ruperez, A	143
Kleven, S H	410	Maertin, B	313	Nuttall, P M	89	145	
Klimeck, B A	489	Maheshwari, R	242	O'Neill, P A F	388	Russell, J D	409
Klimmer, O R	509	Mak, A	459	Ogawa, Y	199	Sagar, G R	321
Klingbail, R L	442	Malek, R B	300	Ogilvie, D M	484	Sahni, M L	253
Klomp, G J	510	Malina, M	563	Ohkuma, S	401	Saito, T	279
Kluge, J P	380	Manolache, F	487	Ohkuma, T	130	401	
Knott, S G	333	Manolev, L	557	Oliver, J H	183	Samarawickrema, W A	146
Kobara, R	171	Manuel, E A	202	Olsson, R	521	Sapunaru, T	487
Kobayashi, S	569	Marenaud, C	535	Olton, G S	117	Sarkar, A R	208
Koch, C R	381	Mariani, M	186	Onda, H	279	254	
Kolomijtseva, I K	532	Marshall, C L	564	Onesto, E	138	Sarlet, L G	47
Kondo, M	569	Marshall, R G	340	Onishi, M	167	147, 148	
Kondo, S	371	Martouret, D	114	Oostendorp, D	446	Saroja, R	291
Koshimizu, K	199	Marvin, B A	575	Ott, D E	485	Satyanarayana, G	255
Kotarski, A	562	Masri, M S	458	Owen, M A	308	Saurat, P	363
Koval, C	241	Mathys, G	125	Page, J R	458	Saure, M	209
Kramer, J P	111	Matthaeus, W	391	Palmer, N J	486	Sautter, J H	410
Krekule, K	540	McAllister, S H	444	Parker, R	323	Scharif, G	246
Kresse, J I	386	McBride, J	314	Parry, R T	402	247	
Krezdorn, A H	530	McConnell, W B	536	Patel, H K	285	Schildknecht, H	149
Krieg, A	100	McCormick, A	534	Pathak, A N	538	Schimmel, D	411
112		McCrae, A W R	126	Pathak, M D	205	Schmittle, S C	354
Kroger, M	480	McDaniel, H A	351	Patil, B P	248	412	
Kubinec, J	507	413		Patterson, J M	206	Schneider, A	135
Kumar, S	531	McDonald, B E	370	Pawsey, R G	207	Schonbeck, F	543
Kurisu, K	167	McEwen, F L	158	Payne, G F	312	Schultc, S J	461
Kuta, J	565	McGhee, R B	392	Peiu, M	487	Schulz, L C	344
Kuzin, A M	532	McLeod, C C	445	Pelet, F	224	Schulze, G	210
Lacey, H J	267	McLeod, R W	299	Pelletier, M	403	Schumann, K	211
Ladwig, V D	382	McMahon, D A	437	Penec, R J	577	Schwabe, W F S	233
Lafever, H N	281	Meier, W	127	Perez-Reyes, R	436	Scott, H M	424
Lagnel, M	34	Meinecke, C	334	Peters, E G	466	Scott, P M	462
Langley, P A	113	Mengeling, W L	393	Pflegel, P	334	Scott, R G	463
Langlois, B E	494	Meyer, H	394	Phillips, A T	353	Scudder, G G E	150
Lanotte, G	383	Micklea, G	459	Picha, J	235	Seaman, E R	348
Larbaight, G	219	Mickovski, M	537	Pichova, D	235	Seidlova, F	540
Larkin, P J	443	Middleton, J T	193	Pienaar, W J	221	Sekulic, R	159
Larsen, C T	410	Mihelic, E L	547	Pitton, J-I	224	Servlee, M W	151
Lasserre, J	363	Miller, J P	283	Pivar, G	318	Shafyi, A	429
Lautie, R	363	Miller, P L	128	Pivnick, H	459	Shanker, H	538
Lawhasnasdi, K	419	Millikan, C R	243	Plant, J W	511	Shaw, A F	322
Le Gal, M	200	Milling, M	459	Poitut, S	84	Shaw, J	152
Le Layec, Cl	357	Mirkamali, A	547	Polizu, A	487	Sherman, K C	413
Leatherdale, D	201	Misra, R V	238	Polony, R	404	Shibata, S	414
Lebeuf, F	384	Mitsui, T	199	Pons, W A Jr.	460	Shimabukuro, R H	490
Lecadent, M	77	Moha, C	129	Pont, A C	43	Shlmamura, T	401
Lecadel, M	114	Monro, J	41	44		Shimizu, T.	414

AUTHOR INDEX

Zweep, W Van Der

Shimmon, J	570	Stobbari, R H	152	431	Watson, W A	450	
Shiyomi, M	153	Stoddart, J L	542	Traub, E	429	Wazenski, T J	464
Sillibourne, J M	95	Stoloff, L	451	Trebhin, H	430	Wearing, C H	172
Silva Fernandes, A M	491	Stritzke, J F	323	Treece, R E	281	Weaving, A J S	187
Simon, J-I	224	Stuart, P	388	Treharne, K J	542	Webb, W R	1
Simons, M D	256	Stymiest, C E	323	Treherne, J E	155	Weiland, E	344
Sineavski, V	487	Su Nam, H	423	Tribe, G W	378	Weiser, J	173
Singh, I P	415	Sugahara, M	424	Tschesche, R	543	174	
Singh, R P	416	Sutherland, I H	440	Tschirley, F H	214	Wells, J M	263
Sivan, J	417	Suzuki, N	335	Tsukamoto, M	4	Wenneis, W F	149
Skender, A	318	Sweet, M H	50	Tuite, J	261	Wenzl, H	292
Skuhrava, M	48	Sylvester, N K	187	Turunen, A	422	Wesman, G E	340
Slavtchev, R S	418	Szelegiewicz, H	51	Twylford, I T	544	Wetzel, T	211
Smilde, K W	257	Takahashi, S	569	Ubrizsy, G	165	White, C A	175
Smirnoff, W A	154	Takemoto, T	102	Ueda, H	569	White, R H	65
Smith, C E G	437	163		Unluclbleici, N	341	Wicken, A J	564
Smith, D B	571	Takizawa, Y	107	Unthank, J E	289	Wilbur, M	326
Smith, D S	155	Taniguchi, M	425	Upadhyaya, V N	141	Williams, C H	512
Smith, G E	468	449		Usher, M B	166	Williams, H E	438
Smith, J	388	Taniyama, T	541	Utsumi, S	167	Williams, I H	470
Smith, P C	419	Tashjian, R J	420	Vago, C	105	Williams, J E	433
Smith, V K	492	Taylor, G A	287	168, 169		Wilson, D W	215
Snyder, J W	420	Taylor, J L	576	Vallee, A	366	Wissdorf, H	344
Soekawa, M	375	Taylor, N W	164	Valli, V J	170	Witzeman, J S	461
Sohn, H S	529	Taylor, O C	193	Van Heek, L A G	325	Wolf, J	91
Sokal, R R	66	Teague, H S	426	Varga, D	159	Woltz, S S	237
156		Teltscherova, L	540	Vavra, J	122	Woong, E	533
Sol, R	157	Tencer, V	507	Verona, O	537	Wulff, G	543
Sousa Lobo, M J de	493	Tennant, B	427	Vialat, Ch	387	Wyatt, G R	176
Splittstoesser, C M	158	Terry, P J	308	Vick, W E	419	Yamaguchi, C	167
Stadelman, W J	494	324		Vidano, C	290	Yamamoto, K	336
Stahl, J	86	Tesha, P V	213	Victs, F G	469	Yamamoto, T	569
Stankovic, A	159	Tesic, T	288	Vieu, J F	387	Yamanaka, T	434
Stanton, J S	419	Tew, R P	95	Villiers, A	53	Yamurias, C	177
Stary, P	160	Thapliyal, P N	239	Vine, B H	262	Yasuno, M	178
Steffan, J R	49	Thier, H-p	496	Vittal, S M	291	Yee, W Y J	327
Stein, R	453	Thomas, D	258	Vlantes, S	568	Young, H	499
Stein, W	161	Thompson, N P	497	Voros, J	165	Yusifov, N I	532
Steinhaus, E A	162	Thomson, G M	258	Vosdingh, R A	428	Zabik, M J	473
Stemp, A R	494	259		431		Zakharchenko, I	342
Stenberg, H	422	Thorne, G	300	Vrgov, M	159	Zakharchenko, S	342
Stewart, B A	469	Tindle, R C	498	Vrtiak, J	404	Zapata, S	180
Stewart, J K	263	Tominaga, T	260	Walker, C E J	432	Zarkower, A	337
Stewart, W C	348	Torma, L	567	Walmsley, D	544	Zimandl, B	223
385, 386		Torrey, J P	393	Warlet, J M.	54	Zwatz, B	264
Stiles, J C	367	Toulgoet, H de	52	Watanabe, H	171	Zweep, W Van Der	500
Stitt, L L	495	Trainer, D O	428				



ORGANIZATIONAL INDEX

- Agricultural Research Council, London Road,
Slough, Bucks,
England; Pest Infestation Laboratory
116
- Agricultural Research Service
338, 412
- Agricultural Research Service
Plant Pest Control Div.
471
- Agricultural Research Service, Beltsville, Md.
Human Nutrition Research Div.
349
- Agricultural Research Service, Washington, D. C.
Entomology Research Div.
56
- Agricultural Univ., Wageningen, Netherlands
Lab. of Phytopathology
514
- Animal Medical Center, New York, N. Y., 10021
420
- Atomic Energy Agency, Seibersdorf, Austria
Seibersdorf Laboratory
41
- Bundesanstalt für Pflanzenschutz, Vienna, Austria
189, 190
- Bureau of Sugar Experiment Stations, Brisbane,
Queensland,
Australia
191
- California Univ., Davis 95616
Dept. of Epidemiology and Preventive Medicine
364
- Canada Department of Agriculture
506, 548
- Centre de Documentation de la C. I. L. B.
19
- Commission Internationale de Lutte Biologique
Contre les
Ennemis des Cultures, Paris, France
74
- Department of Agricultural Technical Services,
Agricultural
Building, Pretoria, Union of South Africa
45
- Department of Agriculture
120
- Department of Agriculture, Victoria, B. C.,
Canada
Field Crops Branch
306
- Department of Agriculture, British Columbia,
Canada
Field Crops Branch
307
- Department of Agriculture, Washington, D. C.
Agricultural Research Service
275
- Dow Chemical Co., Midland, Mich.
442
- Eastman Kodak Co., Rochester, N. Y.
552
- Food and Drug Administration
379, 479
- General Foods Technical Center, White Plains,
N. Y. 10602
461
- Gulf Research and Development Co., Pittsburgh,
Pa.
315
- Hoffman Labs., Inc., Springfield, Mo.
553
- Hokko Chemical Industry Co., Ltd., Chiyoda-tu,
Tokyo, Japan
569
- Illinois University, Urbana
College of Agriculture; Agronomy Dept.
515
- Imperial College, London, England
Dept. of Zoology and Applied Entomology
172
- Institut für mikrobiologie und
Infektionskrankheiten Der
Tierc, Veterinärstr. 13, 8 München 22, West
Germany
429
- Iowa Veterinary Medical Association, Des
Moines 50309
Cholera Eradication Committee
374
- McGill Univ., Montreal, Quebec, Canada
Dept. of Animal Science
370
- Michigan State Univ., East Lansing
Dept. of Dairy
473
- Missouri Univ., Columbia 65201
Experiment Station Chemical Labs.
498
- Monsanto Co., Saint Louis, Mo.
78
- National Agricultural Chemicals Association
482
- National Inst. of Health
392
- National Institutes of Health
Institute of Allergy and Infectious Diseases
111
- National Institute of Allergy and Infectious
Diseases
359
- National Institute of Health
Institute of Arthritis and Metabolic Diseases
332
- National Research Council of Canada, Saskatoon,
Saskat
Chewan; Prairie Regional Lab.
536
- National Research Council, Washington, D. C.
National Academy of Sciences
399
- National Research Council, Washington, D. C.
Subcommittee On Dairy Cattle Nutrition
398
- National Research Council, Washington, D. C.
Subcommittee on Poultry Nutrition
397
- National Science Foundation
123
- Northwestern Conference on Avian Diseases
400
- Northwestern Univ., Evanston, Illinois
Dept. of Biological Sciences
527
- Plant Protection Branch, Salisbury, Rhodesia
32
- Public Health Service
National Inst. of Health
410
- Public Health Service
162
- Queensland Dept. of Primary Industries
333, 352
- Rhodesia Univ. Coll., Salisbury
Dept. of Zoology
113
- Rochester Univ., N. Y.
Dept. of Biology
181
- Rubber Research Inst., Malaya
250
- Rubber Research Institute of Malaya
251
- Rubber Research Institute of Malaya
252
- Shell Oil Co., New York, N. Y.
444
- Società Farmaceutici Italia, Milan, Italy
555
- South Dakota State Univ., Brookings
502
- Southern Conference of Avian Diseases
421
- State Agricultural Research Farm, Berhampore,
West Bengal,
India
139
- Statens Forsøgsvirksomhed I Plantekultur
212
- U S Dept of Agriculture, Ames, Iowa, 50010
Agricultural Research Service; National Animal
Disease Laboratory; Animal Disease and
Parasite Research Division
340
- Union Carbide Australia Ltd., Australia
556
- United Kingdom Ministry of Overseas
Development
207
- United States Steel Corp.
547
- University of Medical Sciences, Bangkok,
Thailand
Faculty of Tropical Medicine
178, 179
- West Indies Univ., Trinidad
Regional Research Centre
544
- Wisconsin Univ., Madison
Dept. of Veterinary Science
360







U.S. DEPARTMENT OF AGRICULTURE
WASHINGTON, D.C. 20250

OFFICIAL BUSINESS



POSTAGE AND FEES PAID
U.S. DEPARTMENT OF AGRICULTURE

To stop mailing ☐ or to change your
address ☐ send this sheet with new
address to Pesticides Information
Center, National Agricultural Library,
Washington, D.C. 20250

5372 USNACU A422 12015 CCC1
USDA NAL CURRENT SERIAL RECO-
RD

WASHINGTON DC 20012